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TUSTIN

GENERAL PLAN

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Circulation
Urban Design
Noise
Economics

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GENERAL PLAN
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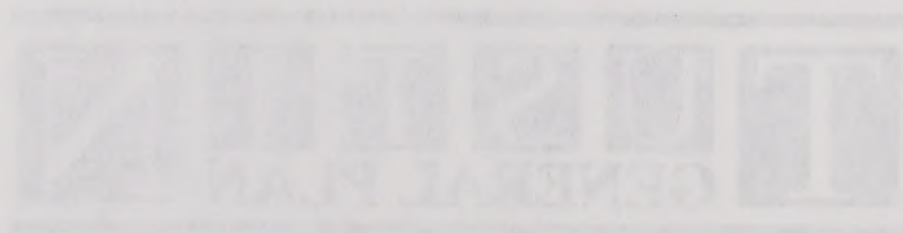
TUSTIN

GENERAL PLAN

Introduction



Introduction



INTRODUCTION TO THE GENERAL PLAN

CITY OF TUSTIN

February 1994

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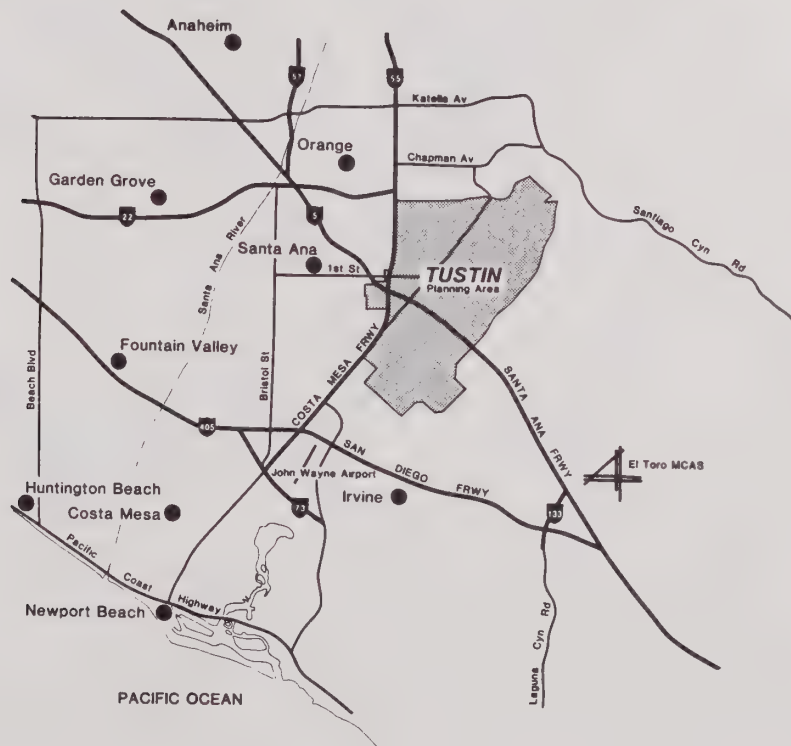
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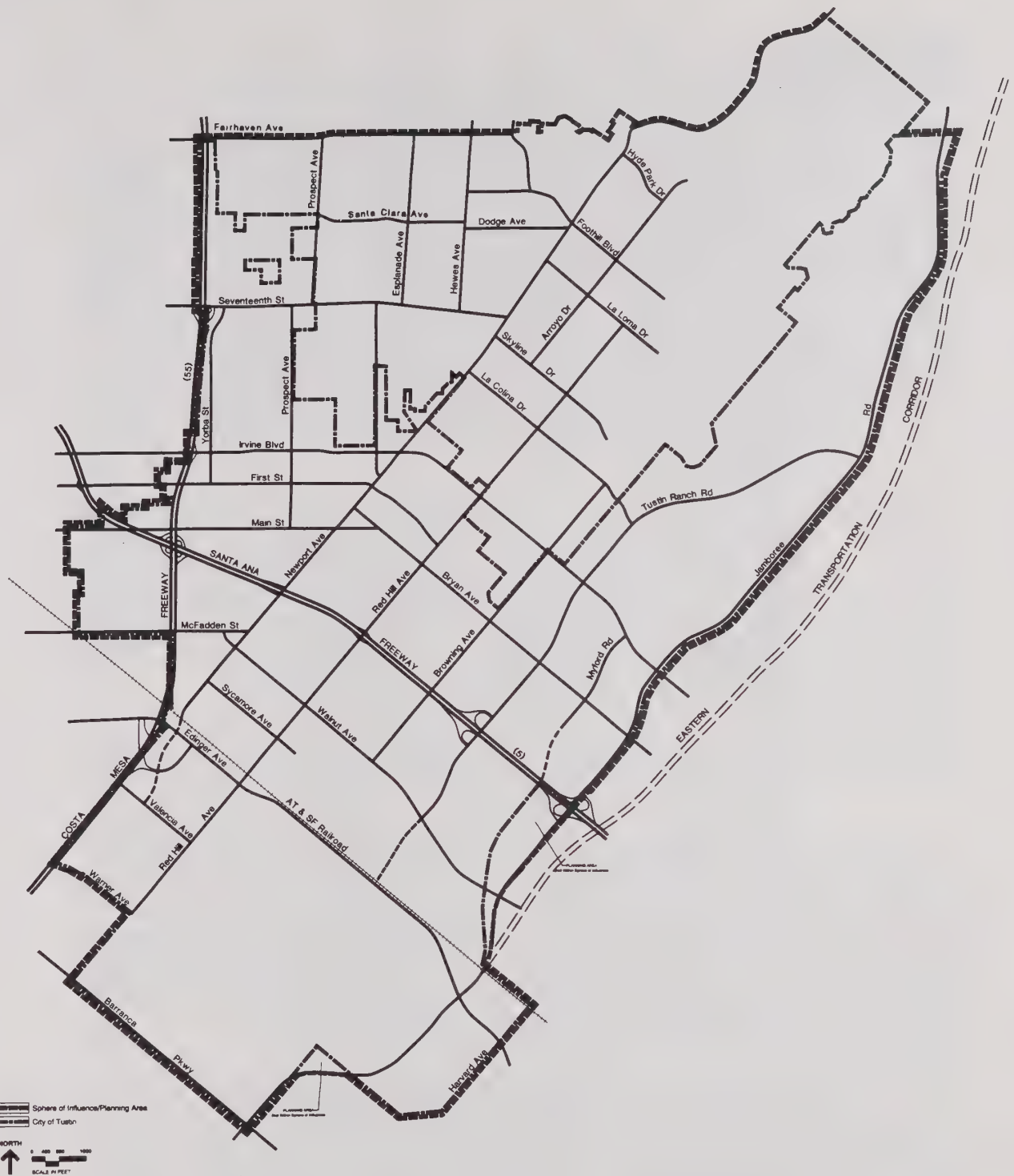
INTRODUCTION TO THE GENERAL PLAN

The City of Tustin is located in central Orange County and encompasses an area of 11.02 square miles. The City is bounded on the south by the cities of Irvine and Santa Ana, on the north by the unincorporated portions of the County of Orange and the City of Orange, and on the east by unincorporated County territory and the City of Irvine. Within the context of the larger Southern California region, Tustin is located approximately two miles north of Orange County's John Wayne Airport and is transected by two major regional freeways: the I-5 (Santa Ana) Freeway, divides the City into north and south; and the SR-55 (Costa Mesa) Freeway, divides westerly portions of the City. The City continues to be a discernible entity, characterized physically by its strategic crossroads location, the existing Marine Corps Air Station, Tustin, hillside areas which offer sweeping panoramic views of the Pacific Coast and Saddleback Mountains, prime commercial, industrial, and residential development, and one of the oldest historical "old towns" in Orange County. These significant natural and man-made characteristics provide a commonly acknowledged basis for a "sense of place". Together, they act as a foundation for Tustin's Future...a functional desirable and attractive community to live, work or visit.



TUSTIN PLANNING AREA

The Tustin Planning Area consists of approximately 17.22 square miles as shown on Figure I-1. This area includes all of the land within the City's incorporated boundaries (11.02 square miles), as well as the City of Tustin's existing "sphere of influence" (an additional 6.2 square miles of unincorporated county area) located immediately adjacent to the City's northerly boundaries and approved by the Local Agency Formation Commission as Tustin's probable ultimate physical boundaries and service area. Two smaller additional areas of approximately 115 acres located adjacent to the City of Tustin's southeasterly boundary are also included in the Tustin Planning Area. Currently within the corporate limits of the City of Irvine, a modification to the City's existing "sphere of influence" and a municipal reorganization would be necessary to make them a part of the City of Tustin.



Tustin very likely first appeared as a name on a map as a result of a real estate venture by a Petaluma carriage maker, Columbus Tustin. Tustin and Nelson O. Stafford, his partner, purchased 1,359 acres of the Rancho Santiago de Santa Ana in 1868 when the Spanish land grant was being partitioned. Tustin took the eastern 839 acres of the total and moved to his property in 1870 to build his dream. He divided 100 acres into 300 square blocks, laid out streets, and provided lots for sale - later giving lots to anyone who would build. However, Tustin experienced slow growth in the 1870s, hampered by Santa Ana's successful bid for the terminus of the Southern Pacific Railroad. Columbus Tustin died in 1883, bitterly disappointed at the minimal success of his dream city.

The land boom of the 1880s brought a second life to Tustin. The Tustin Improvement Association established a bank and a large hotel. From 1886 to 1895, horse-drawn streetcars ("horse car") ran between the Hotel Tustin and Santa Ana. By 1888, the Southern Pacific Railroad had established a station in Tustin and started running two trains daily to Los Angeles.

Several prominent pioneers, David Hewes and Sherman Stevens among them, came to town in this period, building Victorian houses which are still showpieces in town. Sherman Stevens, together with C. E. Utt and James Irvine, developed the first agricultural acreage on the Irvine Ranch and established the San Joaquin Fruit Company. Utt established one of the City's earliest industries, the Utt Juice Company, and was one of Tustin's major developers. Hewes, who made his fortune in San Francisco before settling in Tustin, is renowned as the man who conceived the ceremony and donated the golden spike used to complete the first transcontinental railroad.

The successes of the 1880s were reversed by the Panic of 1893 which led to the demise of several businesses in town and closure of the bank (1902). With the new century came a gradual rebuilding of the economy and the successful additions of the First National Bank of Tustin (1911), the Tustin Lumber Company, Tustin Garage, Tustin Hardware, Piepers Feed Store, the Utt Juice Company, and three large citrus association packing houses.

The City of Tustin incorporated in 1927 as a small agricultural community of approximately 200 acres and 900 residents, making Tustin the third oldest city in Orange County. Development in the community was slow at first due, in part, to the Great Depression of the 1930s. Soon after World War II, urban development began to increase in Tustin as it did throughout Southern California. In 1942, the war brought a new kind of growth to Tustin when the U.S. Navy built its Lighter-Than-Air Base on nearby beanfields. By the 1960s, rising land values and falling grove production induced agricultural land owners to sell their land for urban development. As a result of new development and annexations, the City's population jumped from 2,000 in 1960 to 21,000 in 1970, and continued to grow at a steady pace to reach a 1991 population of over 52,000.

PREVIOUS PLANNING EFFORTS AND NEED FOR A REVISED PLAN

The City of Tustin adopted its first General Plan in 1966. The Plan was prepared as a joint effort between the City of Tustin Planning Department and the County of Orange Advanced Planning Division. At that time, the Tustin General Plan area consisted of 20.5 square miles which included the unincorporated area of North Tustin. The plan anticipated an optimum or maximum population of 100,438 persons within the entire planning area.

Major changes to State law led to preparation and revisions to Tustin's General Plan during the early 1970s. During this period of time, General Plan Elements were developed and/or amended incrementally. However, the real effectiveness of a City's General Plan is contingent upon the practical applicability of the Plan to changing priorities and conditions. Monitoring and reevaluating the validity of Plan policies and amending the Plan from time to time is essential. A comprehensive update of the Plan should be undertaken every five years to ensure that the Plan accurately reflects City policies, conforms to any changes in State law, reflects current court decisions, and provides an integrated and internally consistent set of goals and policies designed to reflect the changing characteristics and growth of the community. To that end, the Tustin City Council authorized a program in February 1991 to undertake a comprehensive update of the General Plan.

PURPOSE OF THE GENERAL PLAN

California State law requires each City to adopt a comprehensive, long-term general plan for its own physical development and any land outside its boundaries which bears a relationship to its planning activities. In essence, a city's general plan serves as the blueprint for future growth and development. As a blueprint for the future, the plan must contain policies and programs designed to provide decision makers with a solid basis for land use related decisions.

The general plan must address many issues which are directly related to and influence land use decisions. In addition to land use, State law requires that the plan address circulation, housing, the conservation of natural resources, the preservation of open space, the noise environment and the protection of public safety (Section 65302 of the California Government Code). These issues are to be discussed to the extent that they apply to a particular jurisdiction. The general plan may also cover topics of special or unique interest to a city, such as urban design and growth management.

ORGANIZATION OF THE GENERAL PLAN

The Tustin General Plan has been prepared in accordance with the requirements of State law and addresses all issues and topics required. The Plan represents a determined effort to examine and synthesize trends which make Tustin the city it is today. Even more importantly, the Plan is intended to project and direct future growth and development.

The Plan consists of numerous policy maps, diagrams, and text which set forth the City's long-range goals and policies, standards, and plan programs. The Tustin General Plan is organized into seven chapters as follows:

- Land Use
- Housing
- Circulation
- Conservation/Open Space/Recreation
- Public Safety
- Noise
- Growth Management

Table I-1 illustrates the relationship between the general plan's seven elements and the seven State-mandated General Plan elements.

TABLE I-1
RELATIONSHIP OF TUSTIN GENERAL PLAN ELEMENTS
TO STATE-MANDATED ELEMENTS

TUSTIN GENERAL PLAN ELEMENT	STATE-MANDATED GENERAL PLAN ELEMENTS						OPTIONAL
	Land Use	Housing	Circulation	Noise	Safety	Conservation/ Open Space	
Land Use	♦						
Housing		♦					
Circulation			♦				
Conservation/ Open Space/ Recreation ⁽¹⁾						♦	♦
Safety					♦		
Noise				♦			
Growth Management ⁽²⁾							♦

(1) The Recreation component of this Element is optional.

(2) While Growth Management is not a State-Mandated Element, it is mandated by Measure M for all jurisdictions in Orange County.

Supporting Documentation

Several supporting documents were produced during the Tustin General Plan preparation process, including the various Technical Reports and the General Plan Program Environmental Impact Report (Program EIR). These documents provide substantial background information for the General Plan.

The preparation of each general plan element was preceded by the preparation of a technical report. The technical reports identify important background information, issues, and constraints (i.e, existing conditions, infrastructure constraints, funding considerations) which were used to guide the formulation of General Plan policy.

The General Plan Program EIR analyzes the potential environmental impacts associated with development of the planning area guided by the policies and programs contained in the General Plan.

Organization and How to Use the Plan

Each of the seven General Plan elements follows a similar organization:

- Introduction
- Summary of Issues, Needs, Opportunities and Constraints
- Goals and Policies
- Element Implementation Program

The Introduction describes the purpose and focus of the element, and also introduces other plans and programs outside of the General Plan which may be used to achieve specific General Plan goals and the relationship of that element to the other elements of the General Plan.

The Goals and Policies section presents the City's long-term desires for the subject area of each element. The goals and policies are arranged by issue or subject, and a brief description of philosophy or basis behind these objectives precedes each group of goals and policies.

Each element also includes a "plan," to implement General Plan policy. For example, the Land Use Element contains a "Land Use Plan" which indicates the types and intensities of land use permitted city-wide. The "Circulation Plan" in the Circulation Element includes a Master Circulation Plan showing streets and intersections to be improved and new infrastructure provided to meet the circulation needs of City residents and those employed in or visiting the City. Wherever possible, each element contains maps, diagrams, and tables to illustrate General Plan policy.

A separate implementation section for each element identifies programs designed to achieve goals and policies in each General Plan element. This Implementation Section should be reviewed and updated periodically to help identify specific time frames, responsible parties, and specific measures to ensure that General Plan policies are implemented.

The General Plan's organization allows those using the Plan to turn to the section that interests them and to quickly obtain a perspective on the City's policies on the subject. However, those using the Plan should realize that various Plan policies from one element to another are interrelated and should be viewed comprehensively. Since Plan policies are presented as both written statements and policy maps,

both text and policy maps must be referred to when making planning decisions.

The General Plan is not a zoning map. The text and policy maps are intended to provide general, broad direction for long-range planning and should be used as a policy guide only. The Zoning Ordinance and Specific Plans, on the other hand, are specific implementation mechanisms which must be consistent with the goals, policies, and standards contained in the General Plan.

PUBLIC PARTICIPATION PROCESS

The public plays an important role in both the preparation and implementation of the General Plan. Because the Plan reflects community goals and objectives, citizen input was essential in identifying issues and formulating goals. Public participation in the General Plan preparation process occurred through the following methods which assisted City decision makers:

- Issues identification through a mail survey distributed to 25,000 households and businesses in the City. The survey questionnaire was divided into 12 questions to assess general satisfaction with Tustin as a place to live, desires regarding future employment and population growth, quality of life priorities, methods for providing affordable housing, and improving neighborhoods, desires for recreational opportunities, and other issues. Responses generally indicated high satisfaction with the City. Several key areas of concern were identified, including: increased residential densities, traffic circulation, controlled growth, environmental preservation, and crime prevention (a complete summary of the survey results is available in the Planning Department);
- Two public "Open House" sessions held early in the process to solicit input for issues identification and goal formulation;
- Opportunities to publicly address decision makers directly regarding issues, concerns, and desires at Planning Commission and Joint City Council/Planning Commission General Plan Workshops, both prior to preparation and during review of the Preliminary Draft General Plan; and
- Public review and comment on the Draft General Plan and its supporting documents during public hearings held before the City's Planning Commission and City Council.

T U S T I N
GENERAL PLAN

Land Use Element



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INTRODUCTION TO THE LAND USE ELEMENT

The Land Use Element is a guide to the allocation of land use in the City and provides a framework or context for the issues and subject areas examined in the other Elements of the General Plan.

PURPOSE OF THE LAND USE ELEMENT

The purpose of the Land Use Element is to describe present and planned land use activity, and to address issues concerning the relationship between land uses and environmental quality, potential hazards, and social and economic objectives. The Element identifies the general distribution and location of residential and non-residential land uses, as well as quantifiable density and building intensity. The Land Use Element constitutes official City policy for the location of various land uses, and provides guidance to ensure orderly growth and development.

Goals and policies included in the Land Use Element establish a constitutional framework for future land use planning and decision making. The Land Use Plan portion of the Element promotes the achievement of these goals by establishing logical, organized land use patterns and standards for future land use. The Plan accomplishes this through the use of descriptive text, tables, charts, and maps.

SCOPE AND CONTENT OF THE ELEMENT

The Land Use Element includes the City's goals and policies for the long-term growth, development and revitalization of Tustin. The Element contains text describing land use goals and policies, descriptions of land use types, a Land Use Policy Map, and a statistical summary of the City's future land use composition. A primary component of this Element is the Land Use Plan Policy Map which graphically identifies future planned land uses within the planning area. The Land Use Element contains a narrative description of the land use designations depicted on the Land Use Plan Policy Map.

The Land Use Element Technical Memorandum, published prior to the preparation of the Land Use Element, is a supporting background document that contains quantitative information about the composition of land use in Tustin in 1991. This technical memorandum may be updated periodically to maintain a data base of current land use conditions in the planning area.

RELATED PLANS AND PROGRAMS

There are a number of state, regional, and county plans and programs which relate to land use in the City. These plans and programs include the Southern California Association of Governments (SCAG) Growth Management Plan, the South Coast Air Quality Management Plan (SCAQMP), the Orange County Growth Management Plan, and the Orange County Airport Environs Land Use Plan (AELUP). Each of these plans is briefly described below.

SCAG Growth Management Plan

The SCAG Growth Management Plan recommends ways to redirect the region's growth in order to minimize congestion and better protect the environment. While SCAG has no authority to mandate implementation of its Growth Management Plan, some of the Plan's principal goals (such as improved jobs/housing balance) have implications for the land use composition of the City and are being implemented through the South Coast Air Quality Management Plan (SCAQMP) under the implementation authority of the South Coast Air Quality Management District.

South Coast Air Quality Management Plan

The South Coast AQMP mandates a variety of measures to reduce traffic congestion and improve air quality, including the Regulation XV Commuter Program which requires employers of more than 100 persons to prepare trip reduction plans and the requirement that each jurisdiction develop an Air Quality component within its general plan. Air Quality is included as a sub-element to the Conservation/Open Space/Recreation Element of the Tustin General Plan to fulfill AQMP requirements. The City's Land Use Element organizes land uses in relation to the circulation system, and present policy promotes

commercial and industrial land uses with convenient access to transportation.

Orange County Growth Management Plan Element

The purpose of the Orange County Growth Management Plan Element is to ensure that the planning, management and implementation of traffic improvements and public facilities are adequate to meet the current and projected needs of Orange County. The Plan establishes the following five major policies:

1. **Development Phasing:** Development will be phased according to Comprehensive Phasing Plans (CPPs) adapted by the County. Phasing will be linked to roadway and public facility capacities.
2. **Balanced Community Development:** Development will be balanced to encourage employment of local residents and both employment and employee housing, in the County as well as in individual Growth Management Areas (GMAs).
3. **Traffic Level of Service:** Future development creates the need for improvements to major intersections significantly impacted by growth, and a developer fee program is included to pay for improving affected intersection on a pro-rata basis.
4. **Traffic Improvement Programs:** The Plan requires comprehensive traffic improvement program to ensure that all new development provides necessary transportation facilities and intersection improvements as a condition of development approval.
5. **Public Facility Plans:** The Plan requires comprehensive public facility plans for fire, sheriff/police, and library services. New development participates on a pro-rata basis.

Implementation of the Plan involves the establishment of:

(1) Growth Management Areas (GMAs) to implement Comprehensive Phasing Plans; (2) Facility Implementation Plans to address the financing of public facilities for each GMA; (3) county-wide implementation and evaluation of compliance with development phasing and improvements; and (4) traffic improvement/public facility development agreements.

Land Use Element policy calls for development and public facilities provision to be managed and balanced, so that the City

receives the benefits of growth without experiencing unnecessary negative impacts.

Orange County Airport Environs Land Use Plan

The Airport Land Use Commission (ALUC) for Orange County has responsibility under state law for formulating a comprehensive airport land use plan (ALUP) for the anticipated growth of each public use airport and its surrounding vicinity. General Plans for cities affected by an ALUP must be consistent with that plan. The purpose of the ALUP is to safeguard the general welfare of the inhabitants within the vicinity of airports and to ensure the continued operation of the airports. The Orange County ALUC has adopted the Airport Environs Land Use Plan (AELUP) governing MCAS Tustin, MCAS El Toro, John Wayne Airport, Meadowlark Airport, AFRC Los Alamitos, and Fullerton Airport. Three issues areas in the AELUP are addressed in the City's General Plan: noise, safety, and building height. The Noise and Safety Elements of the General Plan address noise and safety, while the Land Use Element addresses building height.

RELATIONSHIP TO OTHER GENERAL PLAN ELEMENTS

The Land Use Element is the key element of any General Plan because it has the broadest scope of the mandated elements required in a General Plan. The Element must be prepared with the full knowledge and consideration of the information/policies contained in other General Plan Elements. Specifically, the Land Use Element relates to the Housing Element by defining the extent and density of future residential development in the City. The Land Use Element is also coordinated with the Open Space/Conservation/ Recreation Element, in that open space resources are designated on the Land Use Plan Policy Map, and environmental factors are considered in the location of land use types. The Land Use Element relates to the Safety and Noise Elements by integrating their land use recommendations pertaining to public safety and noise constraints into detailed policies which apply to specific geographic locations. The Circulation and Land Use Elements are interrelated in that specific land use decisions depend upon traffic routes and circulation patterns. Finally, the Land Use Element defines the amount of development permitted to occur, coupled with the Growth Management Element which

establishes policies and procedures to ensure development occurs at a rate consistent with the availability of infrastructure and public services to support such development.

SUMMARY OF ISSUES, NEEDS, OPPORTUNITIES AND CONSTRAINTS

The Land Use Element establishes policy which is reflected in all the other General Plan elements. The following land use issues, needs, opportunities, and constraints have been identified in Tustin, and are addressed in the goals and policies which follow in the next section.

BALANCED DEVELOPMENT IN TUSTIN

- There is a lack of commercial services in certain geographic areas, such as the Irvine Business Center, which warrants consideration of additional commercial designations.
- Land use patterns encourage Tustin residents to rely on the automobile to commute to work and shopping.
- The City has the opportunity to purchase surplus freeway parcels and develop them with uses which capitalize on their freeway accessibility.
- With MCAS Tustin designated for closure, the City has a significant opportunity for future planning and development on this 1,500 acre site.
- The annexation of certain areas in North Tustin could establish more logical City boundaries.
- Hillside areas within the City's sphere of influence may be subject to slope instability. In the event of annexation, significant infrastructure deficiencies, where they exist, shall be mitigated to the extent feasible.

COMPATIBLE AND COMPLEMENTARY DEVELOPMENT

- The intermixing of land uses in some areas without adequate buffering has resulted in land use incompatibilities, such as those related to physical scale, noise, and traffic. Specific

types and examples of incompatible land uses include the following:

- obtrusive industrial uses adjacent to residential development;
 - commercial uses abutting residential development without adequate buffering;
 - high density residential adjacent to lower residential densities without adequate buffering;
 - noise sensitive uses adjacent to freeways, highways and railroads.
- o New development, if not regulated, can interfere with public vistas and views of the surrounding hillsides, public monuments, and other important viewsheds.

REVITALIZATION OF OLDER COMMERCIAL, INDUSTRIAL AND RESIDENTIAL USES AND PROPERTIES

- o While most of Tustin's housing stock is in good condition, certain neighborhoods, such as the Southwest area of the City, are in need of concentrated rehabilitation and code enforcement efforts.
- o Tustin contains numerous historically and architecturally significant structures whose maintenance and preservation is important to the heritage of the community.
- o Some of the City's older residential areas are impacted by adjacent freeways, commercial and industrial land uses.
- o Some of the City's older commercial and industrial uses are either in need of upgrading or replacement.

IMPROVED CITY-WIDE URBAN DESIGN

- o Although Tustin has many individual assets, the City needs to develop an integrated overall image that clearly connects the best parts of the community.
- o Many of Tustin's strip commercial corridors exhibit a fragmented land use pattern and lack of design continuity.

- With the exception of several recent commercial centers, the City's commercial districts are in need of reinforced landscape character, stronger design coordination, improved circulation and parking linkages, outdoor pedestrian spaces, and higher quality architecture and signage.
- Tustin's design standards for multi-family development need to be strengthened to provide for greater private and public open space, and better buffering between adjacent incompatible land uses.
- The developing and changing industrial/R&D districts are transforming the southern part of Tustin, and are in need of standards to ensure high quality design.

ECONOMIC EXPANSION AND DIVERSIFICATION

- In order to create a better jobs/housing balance, efficient utilization of commercial and industrial designated properties is crucial.
- To keep Tustin's retail space competitive, retail development should be focused in "centers" which provide a greater variety of goods and amenities rather than strip commercial developments.
- The office and hotel markets in Tustin are not competitive with neighboring jurisdictions due to the City's limited supply of these land uses.

DEVELOPMENT COORDINATED WITH PUBLIC FACILITIES AND SERVICES

- As new development continues to occur in Tustin and existing uses intensify, adequate public facilities and services - such as fire and police protection, flood control, educational and recreational opportunities - must be available to accommodate future development.

DEVELOPMENT CHARACTER IN EAST TUSTIN

- The opportunity exists in East Tustin to ensure hillside development protects the natural terrain, and that significant open space resources (such as the eucalyptus windrows and stand of redwoods) are preserved.
- In an area as large as East Tustin, the provision of land uses which support the resident population to minimize travel distances to shopping, recreation and service uses.
- Important viewsheds in East Tustin, including the Peters Canyon ridgeline, the redwood/cedar grove, the knoll, and major tree stands, should be protected from intrusion.

DEVELOPMENT CHARACTER IN OLD TOWN/FIRST STREET AREA

- Old Town Tustin lost its focus as the community's commercial center years ago due to the development of competing commercial corridors outside this district.
- The unique qualities of Old Town have yet to be fully capitalized on to create a vital commercial district.
- The integration of residential uses in Old Town could provide increased market support for retail and commercial uses, and could improve the vitality of the district.
- Much of the First Street corridor exhibits a fragmented pattern of land use, and many of the buildings are in need of facade improvements.

DEVELOPMENT CHARACTER IN THE PACIFIC CENTER EAST AREA

- The Pacific Center East Area, including the Warner Business Park to the south, lacks a unified development image.
- Through the development of office, hotel and business park uses in Pacific Center East, the City has substantial opportunities to expand its economic base.

- Opportunities exist for freeway-oriented development adjacent to SR-55 and the existing and planned northbound (eastside) ramps to SR-55.

NORTH TUSTIN (UNINCORPORATED AREA)

- The unincorporated North Tustin area has a well developed low-density semi-rural character which would expand the scope of housing availability and add a valuable housing diversity to the City.
- To preserve the low density semi-rural character, there is a need to ensure that any infill development is compatible and complimentary to this existing community.

LAND USE ELEMENT GOALS AND POLICIES

The goals and policies contained in the Land Use Element provide the framework for land use planning and decision-making in the City. They are an outgrowth of issues, needs, opportunities and constraints identified during preparation of the General Plan including concerns of Tustin residents and selection of the preferred growth alternative. They reflect the direction and image the City seeks for the future. The goals and policies of this element are intended to:

- Achieve balanced development;
- Ensure that compatible and complementary development occurs;
- Revitalize older commercial, industrial, and residential development;
- Improve city-wide urban design;
- Promote economic expansion and diversification;
- Coordinate development with the provision of adequate public facilities and services;
- Ensure that the development character of East Tustin is compatible with the surrounding man-made and natural environment;
- Strengthen the development character and mixture of uses in the Old Town/First Street area; and
- Promote an integrated business park character for the Pacific Center East area.

BALANCED DEVELOPMENT IN TUSTIN

A broad range of land uses within the planning area - residential, commercial, industrial, public facilities and open space - offers a balance between the City's revenue generation needs and service provision responsibilities.

GOAL 1: Provide for a well balanced land use pattern that accommodates existing and future needs for housing, commercial and industrial land, open space and community facilities and services, while maintaining a healthy, diversified economy adequate to provide future City services.

Policy 1.1: Preserve the low-density quality of Tustin's existing single-family neighborhoods while permitting compatible multi-family development to meet regional housing needs where best suited from the standpoint of current development, accessibility, transportation and public facilities.

Policy 1.2: Provide for and encourage the development of neighborhood-serving commercial uses in areas of Tustin presently underserved by such uses. Encourage the integration of retail or service commercial uses on the street level of office projects.

Policy 1.3: Facilitate the development of vacant and underutilized freeway parcels with commercial uses where appropriate and compatible with surrounding uses to capitalize on their freeway access and visibility.

Policy 1.4: Designate the Marine Corps Air Station Tustin as a specific study area to provide for future planning and development for the closure of this military base.

Policy 1.5: Consider modification of present City boundaries in unincorporated areas within the City of Tustin's sphere where they are irregular and create inefficiencies.

Policy 1.6: Encourage compatible and complementary infill of previously by-passed parcels in areas already predominately developed.

Policy 1.7: Ensure an adequate supply of commercial and industrial land within the City of Tustin for potential commercial and industrial expansion and development.

Policy 1.8: As part of the City's attraction to business and industry, provide adequate sites to house future employees.

Policy 1.9: Provide incentives to encourage lot consolidation and parcel assemblage to provide expanded opportunities for coordinated development and redevelopment.

Policy 1.10: Provide development of light industrial and business park uses under strict performance development standards. Encourage industrial and business parks as the preferred method of accommodating industrial growth.

Policy 1.11: Ensure that the distribution and intensity of land uses are consistent with the Land Use Plan and classification system.

Policy 1.12: Where feasible, increase the amount and network of public and private open space and recreational facilities which will be adequate in size and location to be useable for active or passive recreation as well as for visual relief.

Policy 1.13: Evaluate all future annexation proposals within the City's sphere of influence for their potential financial, social and environmental impacts on the City of Tustin. The analysis of financial impacts shall include preparation of a fiscal impact report which provides an analysis of impacts on operating costs and costs associated with needed short and long term capital improvements.

Policy 1.14: Preserve the existing low density character of North Tustin single family zoned neighborhoods.

GOAL 2: Ensure that future land use decisions are the result of sound and comprehensive planning.

Policy 2.1: Consider all General Plan goals and policies, including those in other General Plan elements, in evaluating proposed development projects for General Plan consistency.

Policy 2.2: Maintain consistency between the Land Use Element, Zoning Ordinances, and other City ordinances, regulations and standards.

Policy 2.3: Endeavor to promote public interest in, and understanding of, the General Plan and regulations relating to it.

Policy 2.4: Encourage citizen participation in planning and development of land use programs.

Policy 2.5: Foster inter-governmental cooperation and coordination in order to maximize the effectiveness of land use policies.

Policy 2.6: Maintain consistency with the County of Orange Airport Environs Land Use Plan in terms of maximum allowable building height, noise levels, safety areas, and other applicable standards.

COMPATIBLE AND COMPLEMENTARY DEVELOPMENT

Intermixing of different land uses can result in incompatibilities attributable to differences in traffic levels, noise levels, physical scale, and hours of operation. Incompatibility can also occur when the characteristics of a specific land use do not match the physical characteristics of available land (such as intensive development in hillside areas).

GOAL 3: Ensure that new development is compatible with surrounding land uses in the community, the City's circulation network, availability of public facilities, existing development constraints and the City's unique characteristics and resources.

Policy 3.1: Coordinate and monitor the impact and intensity of land uses in adjacent jurisdictions on Tustin's transportation and circulation systems to provide for the efficient movement of people and goods with the least interference.

Policy 3.2: Locate major commercial uses in areas that are easily accessible to major transportation facilities.

Policy 3.3: Allow development clustering in hillside areas when this method will better preserve the natural terrain and open character of the City.

Policy 3.4: In designing hillside development, give particular attention to maximizing view opportunities, minimizing dangers of geologic and soil hazards, minimizing adverse visual impact on surrounding areas, ensuring compatibility with the natural environment, to the maximum extent possible, and recognize other General Plan policies.

Policy 3.5: Hillside development should be designed to follow natural contours, where possible, and to minimize the amount of land alteration. The location and design of structures and access should maximize the natural appearance of the hillside areas. Development of isolated areas which can only be reached by going through steep terrain should be discouraged.

Policy 3.6: Regulate development in identifiable hazardous areas or in areas that are environmentally sensitive.

Policy 3.7: Encourage the preservation and enhancement of public vistas, particularly those seen from public places.

Policy 3.8: Encourage consolidation of parking and reciprocal access agreements among adjacent businesses.

GOAL 4: Assure a safe, healthy and aesthetically pleasing community for residents and businesses.

Policy 4.1: Mitigate traffic congestion and unacceptable levels of noise, odors, dust and light and glare which affect residential areas and sensitive receptors.

Policy 4.2: Ensure a sensitive transition between commercial or industrial uses and residential uses by means of such techniques as buffering, landscaping and setbacks.

Policy 4.3: Where mixed uses are permitted, ensure compatible integration of adjacent uses to minimize conflicts.

Policy 4.4: Encourage the elimination of non-conforming uses and buildings.

Policy 4.5: Ensure adequate monitoring of those uses which involve hazardous materials to avoid industrial accidents, chemical spills, fires and explosions.

Policy 4.6: Maintain and enhance the quality of healthy residential neighborhoods, and safeguard neighborhoods from intrusion by non-conforming and disruptive uses.

REVITALIZATION OF OLDER COMMERCIAL, INDUSTRIAL AND RESIDENTIAL USES AND PROPERTIES

Revitalization of older residential and non-residential development through rehabilitation, preservation, and redevelopment of the existing stock of land, landscaping, buildings and public infrastructure is necessary to maintain the quality of an urban environment.

GOAL 5: Revitalize older commercial, industrial and residential uses and properties.

Policy 5.1: Encourage and continue the use of redevelopment activities, including the provision of incentives for private development, joint public-private partnerships, and public improvements, in the Town Center and South/Central redevelopment project areas.

Policy 5.2: Provide development incentives to facilitate the consolidation of individual parcels along the City's commercial corridors.

Policy 5.3: Encourage the rehabilitation of existing commercial facades and signage.

Policy 5.4: Continue to provide rehabilitation assistance in targeted residential neighborhoods to eliminate code violations and enable the upgrading of residential properties.

Policy 5.5: Encourage the restoration and rehabilitation of properties in Tustin eligible for inclusion on the National Register of Historic Places according to the rehabilitation guidelines and tax incentives of the National Trust for Historic Preservation.

Policy 5.6: Promote vigorous enforcement of City codes, including building, zoning, and health and safety, to promote building and property maintenance. Prioritize the Southwest area of the City for code enforcement.

Policy 5.7: Continue, as feasible, operation of a graffiti removal program to facilitate prompt removal of graffiti on private property.

Policy 5.8: Improve edge conditions and buffers between older residential neighborhoods and adjacent freeway edges and commercial and industrial uses.

IMPROVED CITY-WIDE URBAN DESIGN

As cities grow and mature, individual neighborhoods and districts can become either difficult to distinguish or isolated unless strong identifiable physical features are emphasized and access between areas is strengthened.

GOAL 6: Improve urban design in Tustin to ensure development that is both architecturally and functionally compatible, and to create uniquely identifiable neighborhoods, commercial and business park districts.

Policy 6.1: Develop citywide visual and circulation linkages through strengthened landscaping, pedestrian lighting, bicycle trails (where feasible) and public identity graphics along major street corridors.

Policy 6.2: Encourage and promote high quality design and physical appearance in all development projects.

Policy 6.3: Improve the image of major highways through the use of pedestrian amenities, landscaping, lighting, graphics and/or other on-site and streetscape treatments.

Policy 6.4: Preserve and enhance the City's special residential character and "small town" quality by encouraging and maintaining Tustin's low density residential neighborhoods through enforcement of existing land use and property development standards and the harmonious blending of buildings and landscape.

Policy 6.5: Preserve historically significant structures and sites, and encourage the conservation and rehabilitation of older buildings, sites and neighborhoods that contribute to the City's historic character.

Policy 6.6: Improve the overall quality of Tustin's multi-family neighborhoods through: a) improved buffers between multi-family residences and adjacent freeway edges, commercial and industrial uses; b) provision of usable private and common open space in multi-family projects; c) increased code enforcement; and d) improved site, building, and landscape design.

Policy 6.7: Emphasize the Civic Center area as the focal point of community, civic, cultural and recreational activities.

Policy 6.8: Wherever possible, create an "office park" or "campus-like" environment for industrial and business park developments.

Policy 6.9: Upgrade the visual quality of edge conditions between industrial and residential uses through street tree planting and on-site landscaping.

Policy 6.10: Reinforce Tustin's image and community identity within the greater Orange County urban area.

Policy 6.11: Encourage the establishment of unique identity in the City's neighborhoods.

Policy 6.12: Review and revise, as necessary, the City's development standards to improve the quality of new development in the City and to protect the public health and safety.

ECONOMIC EXPANSION AND DIVERSIFICATION

A broadening of the City's economic base will ensure long-term fiscal stability and maintenance of City revenues.

GOAL 7: Promote expansion of the City's economic base and diversification of economic activity.

Policy 7.1: Broaden the City's tax base by attracting businesses which will contribute to the City's economic growth and employment opportunities while ensuring compatibility with other General Plan goals and policies.

Policy 7.2: Capitalize on office and hotel markets through encouraging the development of these uses.

Policy 7.3: Coordinate efforts between the City's Redevelopment Agency and Chamber of Commerce to actively market Tustin to prospective industries.

Policy 7.4: Promote the maintenance, marketing and further development of the Tustin Market Place and Tustin Auto Center as regional retail destinations.

Policy 7.5: (a) Focus retail development into consolidated, economically viable and attractive centers of adequate size and scale which offer a variety of retail goods and amenities; (b) reinforce quality highway and scenic development adjacent to the City's major transportation corridors; and (c) discourage typical strip commercial development.

DEVELOPMENT COORDINATED WITH PUBLIC FACILITIES AND SERVICES

Adequate public facilities and services are essential components of urban development. The City must be able to expand its facilities and services to accommodate new development, as well as maintaining or improving facility and service levels for existing development.

GOAL 8: Ensure that necessary public facilities and services are available to accommodate development proposed on the Land Use Policy Map.

Policy 8.1: Encourage within economic capabilities, a wide range of accessible public facilities and community services including fire and police protection, flood control and drainage, educational, cultural and recreational opportunities and other governmental and municipal services.

Policy 8.2: Define needs and deficiencies that are within the City, and introduce priority projects into the City's budget process.

Policy 8.3: Coordinate and collaborate with other agencies providing public utility service to Tustin to define areawide and regional needs, projects and responsibilities.

Policy 8.4: Coordinate the construction of all public utilities to minimize disruption of vehicular traffic and negative impacts on roadways.

Policy 8.5: Continue to make incremental improvements to the flood control and drainage system.

Policy 8.6: Encourage planned improvements to electricity, natural gas, and communication service systems.

Policy 8.7: To ensure an orderly extension of essential services and facilities, and preservation of a free-flowing circulation system, continue to require provision of essential facilities and services at the developer's expense where these systems do not exist or are not already part of the City's financed capital improvement program.

Policy 8.8: Maintain and improve, where necessary, the City's infrastructure and facilities.

DEVELOPMENT CHARACTER IN EAST TUSTIN

East Tustin will provide the majority of new residential development within the planning area. The planned community approach for development of the area can achieve a balance between urban use of land and maintenance of the natural environment.

GOAL 9: Provide for a planned community in East Tustin compatible with the land use characteristics of the local area and sensitive to the natural environment.

Policy 9.1: Ensure the compatibility of development in East Tustin adjacent to existing developed areas.

Policy 9.2: Provide for supporting land uses in East Tustin, including neighborhood commercial centers, park and recreational facilities, and schools, to serve the residential community.

Policy 9.3: Continue development phasing which provides incremental growth that is coordinated with the existing adjacent development, infrastructure and market opportunities.

Policy 9.4: Enforce the East Tustin Hillside District Guidelines to preserve the natural terrain of Tustin's undeveloped hillsides.

Policy 9.5: Require graded slopes to undergo permanent re-vegetation in a timely manner to minimize chance of erosion and siltation. Encourage the use of drought-tolerant and fire resistant plant materials.

Policy 9.6: Retain natural landscape to the maximum extent possible, and incorporate planting in new development areas compatible with the character and quality of the natural surrounding environment.

Policy 9.7: Encourage the clustering of development in hillside areas to minimize grading impacts and/or retain natural features and vegetation.

Policy 9.8: Encourage clustering of residential uses to minimize impacts from noise, flooding, slope instability and other environmental hazards.

Policy 9.9: Site buildings and align roadways to maximize public visual exposure to the north-south Peters Canyon ridgeline, the redwood/cedar grove, the knoll and major tree stands.

DEVELOPMENT CHARACTER IN OLD TOWN/FIRST STREET AREA

The development character of Old Town and the First Street area can be significantly enhanced by greater integration of residential uses and physical renovations to existing buildings and street frontages which promote a pedestrian orientation.

GOAL 10: Improve and strengthen the Tustin Old Town/First Street area with a unique pedestrian environment and diverse mix of goods, services, and uses.

Policy 10.1: Improve the Old Town District's identity as the City's historical and architectural focus and its contribution to the City's economic base.

Policy 10.2: Review and consider the possible development of residential uses in the Old Town area both as individual residential projects, and integrated above ground floor retail and office uses.

Policy 10.3: Encourage outdoor pedestrian spaces, such as courtyards, arcades and open landscaped passages, to be integrated into new development. Encourage high-quality pedestrian-oriented building frontages which open onto these pedestrian spaces and public sidewalks.

Policy 10.4: Develop and use signage to promote a district parking concept that emphasizes shared parking facilities. Promote improvements which will upgrade circulation and access in the Old Town District.

Policy 10.5: Study the potential expansion of the Cultural Resources Overlay District north of First Street to Irvine Boulevard.

Policy 10.6: Encourage the integration of retail or service commercial uses on the street level of office projects through flexibility in site development standards.

Policy 10.7: Encourage the consolidation of individual parcels/ consolidated site planning and parking and access along First Street and in Old Town through utilization of development incentives such as reduced parking, height bonus, lot coverage relaxation, allowance for secondary uses, fee waivers, and/or financial assistance in land acquisition and/or infrastructure improvements.

Policy 10.8: Encourage rehabilitation of existing facades and signage to comply with First Street Specific Plan guidelines and any future design guidelines for Old Town.

Policy 10.9: Review the First Street Specific Plan including modifications to Plan which would consider issues associated with eliminating and prohibiting future automobile service-related uses and restrictions on the expansion of existing automobile service-related uses.

DEVELOPMENT CHARACTER IN THE PACIFIC CENTER EAST AREA

The future image of the Pacific Center East area will consist of a more intensive and integrated business park environment. The area's distinct location adjacent to SR 55 creates a significant opportunity to capitalize on its freeway orientation to achieve regional recognition.

GOAL 11: Provide for an integrated business park environment in the Pacific Center East Area which both capitalizes on market opportunities and is compatible with adjacent developed land uses.

Policy 11.1: Provide a wide range of uses and intensities which meet the City's future needs for mixed land uses and for a variety of facilities and services in the project area, and which capitalize on visibility and access of freeway interchange locations.

Policy 11.2: Create a cohesive architectural image and attractive streetscape through implementation of development standards and design guidelines to unify the area.

Policy 11.3: Promote building forms that relate to the scale and character of surrounding development while also relating new development to pedestrian functions.

Policy 11.4: Integrate existing uses, new development and potential future redevelopment uses.

Policy 11.5: Upgrade the edge conditions between industrial/business park uses and residential development through private development standards and onsite landscaping of industrial/business park uses.

NORTH TUSTIN (UNINCORPORATED AREA)

The North Tustin unincorporated area has a low density, semi-rural character. This desirable character is sensitive and vulnerable.

GOAL 12: Maintain the semi-rural and low-density character of North Tustin.

Policy 12.1: Ensure that any infill development in North Tustin is compatible and complimentary to the existing North Tustin community.

Policy 12.2: Review and consider the possible development and adoption of pre-zoning designation for the North Tustin unincorporated area as part of any annexation proposal.

Policy 12.3: Identify the North Tustin Specific Plan Area and entire North Tustin unincorporated area as a Special Management Area.

RELATED GOALS AND POLICIES

The goals and policies described in the Land Use Element are related to and support subjects included within other General Plan elements. In turn, many goals and policies from the other elements directly or indirectly support the goals and policies of the Land Use Element. These supporting goals and policies are identified in Table LU-1.

**TABLE LU-1
LAND USE RELATED GOALS AND POLICIES BY ELEMENT**

	RELATED GOALS AND POLICIES BY ELEMENT						
	Land Use	Housing	Circulation	Conservation/ Open Space	Public Safety	Noise	Growth Management
Balanced Development		1.9, 3.1	1.10, 5.2, 5.6	2.12, 8.11, 14.12, 14.13, 15.2			1.1, 2.5, 2.6, 2.7, 2.8, 4.1
Compatible/ Complementary Development			1.11, 4.4, 4.5, 5.1, 6.2, 6.12	1.3, 1.4, 7.3, 7.4, 8.1, 8.5, 8.7, 8.9, 8.10, 8.12, 8.13, 8.16, 14.7, 14.8, 14.9, 17.3, 18.5	1.6, 3.3, 3.9, 4.5, 7.1, 7.2	1.2, 1.9, 2.3, 2.4, 2.5, 2.7, 2.8	
Revitalization of Older Development		1.2, 1.3, 5.1, 5.3, 5.3		12.1	9.1		
Improved City-wide Urban Design		1.18	1.2, 1.9, 1.14, 6.8	1.2, 1.5, 5.3, 7.1, 8.6, 11.1, 11.2, 12.3, 14.1, 17.2	5.2, 6.5	2.6	
Economic Expansion/ Diversification		2.5					
Public Facilities/ Services Coordination			1.16, 6.9	2.10, 5.6, 14.5, 14.6, 16.10, 18.4	3.2, 5.3		3.1, 3.2
East Tustin Character				7.6, 8.15, 8.17, 14.14, 14.15, 15.1			
Old Town/First Street Character							
Pacific Center East Character							
North Tustin (Unincorporated Area)							

LAND USE POLICY MAPS

The Land Use Policy Maps reflect the application of General Plan goals and policies to the distribution and intensity of future land uses in the City of Tustin as well as areas which are within the City's Sphere of Influence. There are three Land Use Policy Maps which are a part of this Element. They are the Land Use Plan Policy Map and two Special Management Areas Policy Maps.

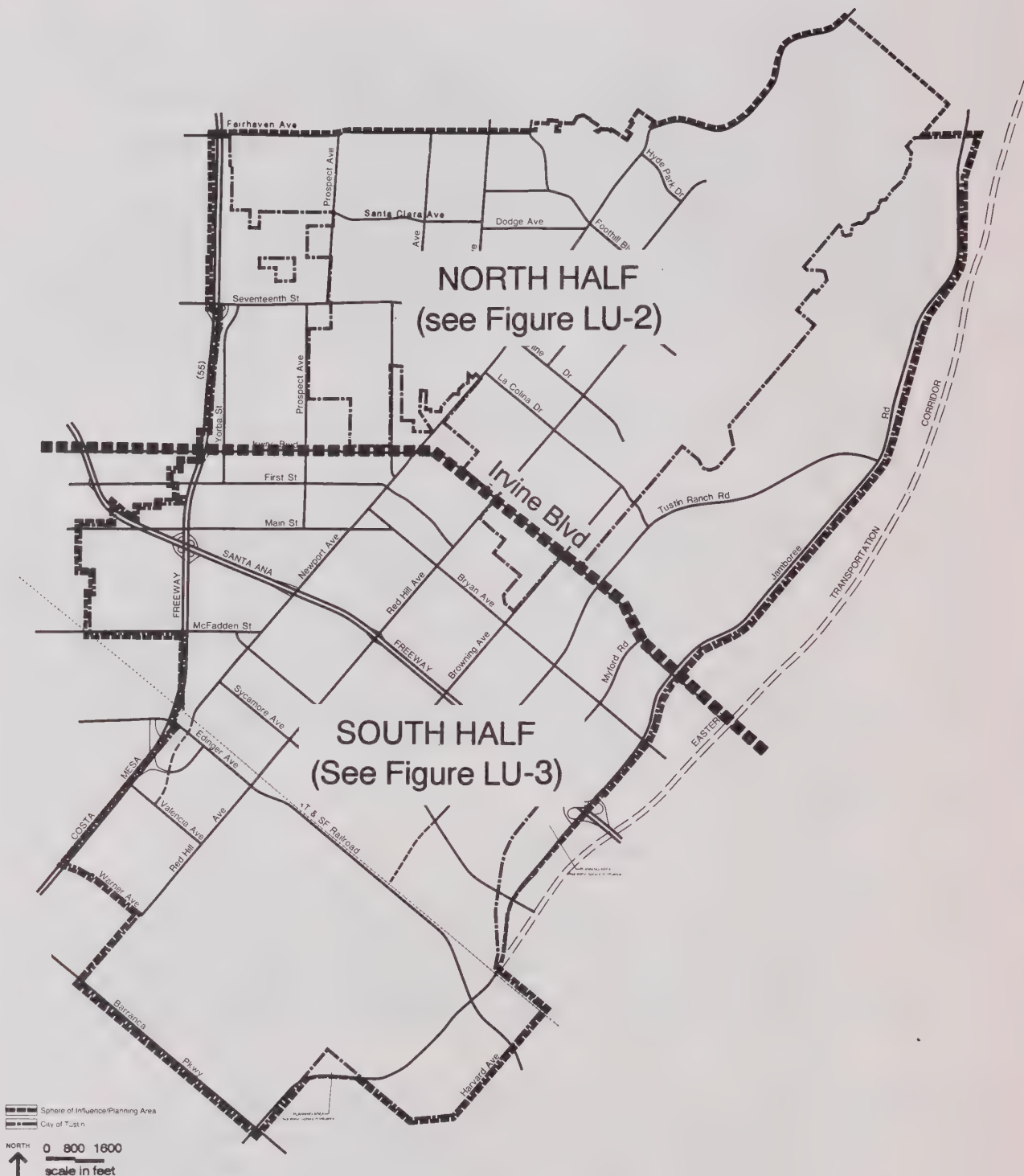
LAND USE PLAN AND POLICY CONSIDERATIONS

Figures LU-1, -2 and -3 represent the Land Use Plan for the Tustin Planning Area. The plan is also reproduced at a larger scale and is available from the Tustin Community Development Department. While the Land Use Plan describes the general pattern of land uses at build-out, the Plan is not a zoning map and should be interpreted as a generalized guide to the type, intensity and relationship of land uses. Upon adoption of the General Plan, the City will then begin the process of modifying the Zoning Ordinance to ensure its consistency with the Land Use Plan.

Land Use Designations

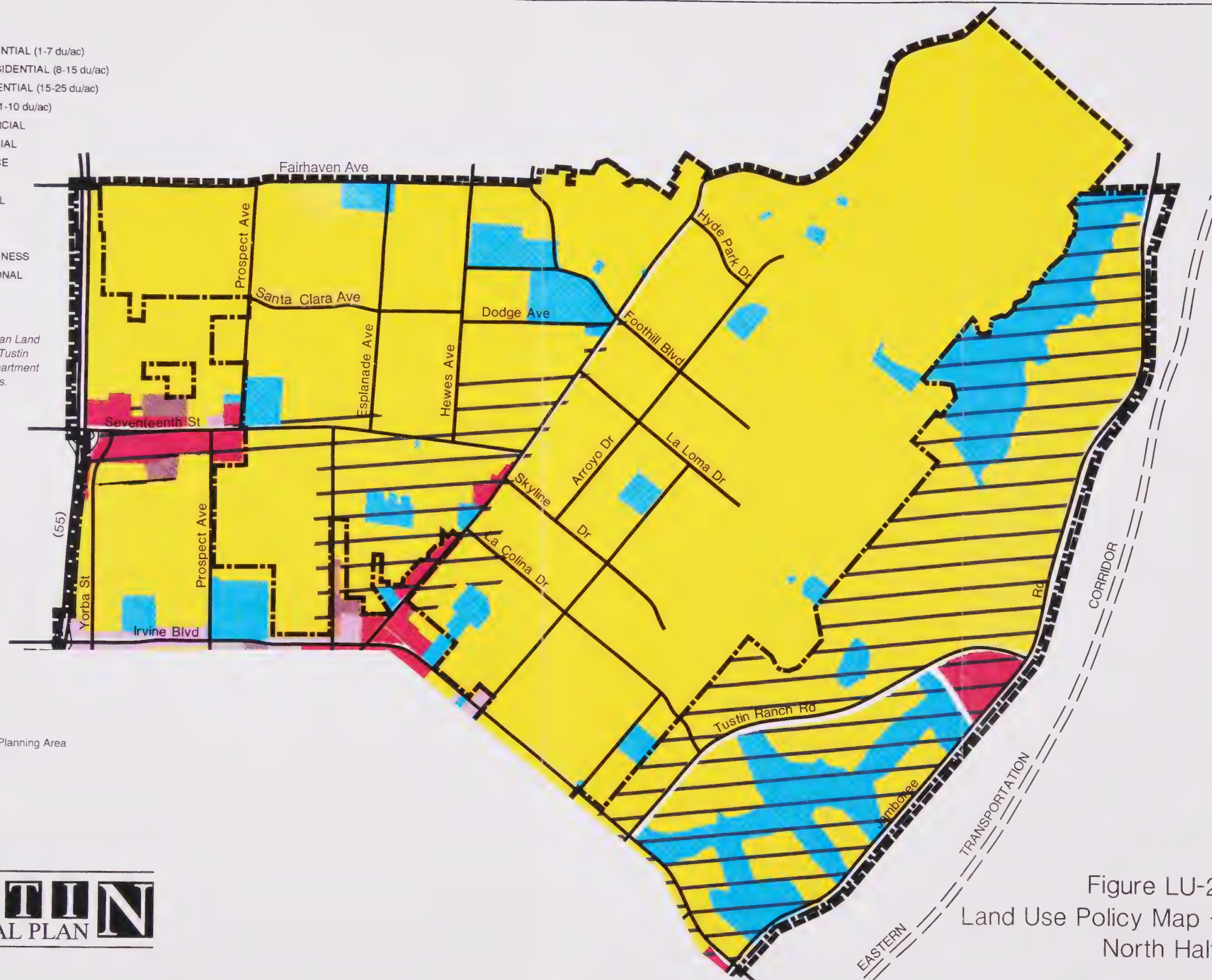
Land Use designations indicate the type and nature of development that is allowed in a given location. While terms like "residential," "commercial" and "industrial" are generally understood, State General Plan law requires a clear and concise description of the land use categories shown on the Land Use Plan Policy Map.

The Land Use Element provides for six major land use groupings divided into 14 categories or designations as listed in Table LU-2. Four of these designations are established for residential development, ranging from low-density single family to high-density multiple family development. Three



- LOW DENSITY RESIDENTIAL (1-7 du/ac)
- MEDIUM DENSITY RESIDENTIAL (8-15 du/ac)
- HIGH DENSITY RESIDENTIAL (15-25 du/ac)
- MOBILE HOME PARK (1-10 du/ac)
- COMMUNITY COMMERCIAL
- OLD TOWN COMMERCIAL
- PROFESSIONAL OFFICE
- INDUSTRIAL
- PUBLIC/INSTITUTIONAL
- MILITARY
- PC RESIDENTIAL
- PC COMMERCIAL/BUSINESS
- PC PUBLIC/INSTITUTIONAL
- TRANSPORTATION

Please refer to the General Plan Land Use Policy map in the City of Tustin Community Development Department for parcel specific designations.



Sphere of Influence/Planning Area
 City of Tustin

NORTH

 0 400 800 1600
 SCALE IN FEET

TUSTIN
GENERAL PLAN

Figure LU-2
Land Use Policy Map -
North Half

- LOW DENSITY RESIDENTIAL (1-7 du/ac)
- MEDIUM DENSITY RESIDENTIAL (8-15 du/ac)
- HIGH DENSITY RESIDENTIAL (15-25 du/ac)
- MOBILE HOME PARK (1-10 du/ac)
- COMMUNITY COMMERCIAL
- OLD TOWN COMMERCIAL
- PROFESSIONAL OFFICE
- INDUSTRIAL
- PUBLIC/INSTITUTIONAL
- MILITARY
- PC RESIDENTIAL
- PC COMMERCIAL/BUSINESS
- PC PUBLIC/INSTITUTIONAL
- TRANSPORTATION

Please refer to the General Plan Land Use Policy map in the City of Tustin Community Development Department for parcel specific designations.

- Sphere of Influence/Planning Area
- City of Tustin



TUSTIN
GENERAL PLAN

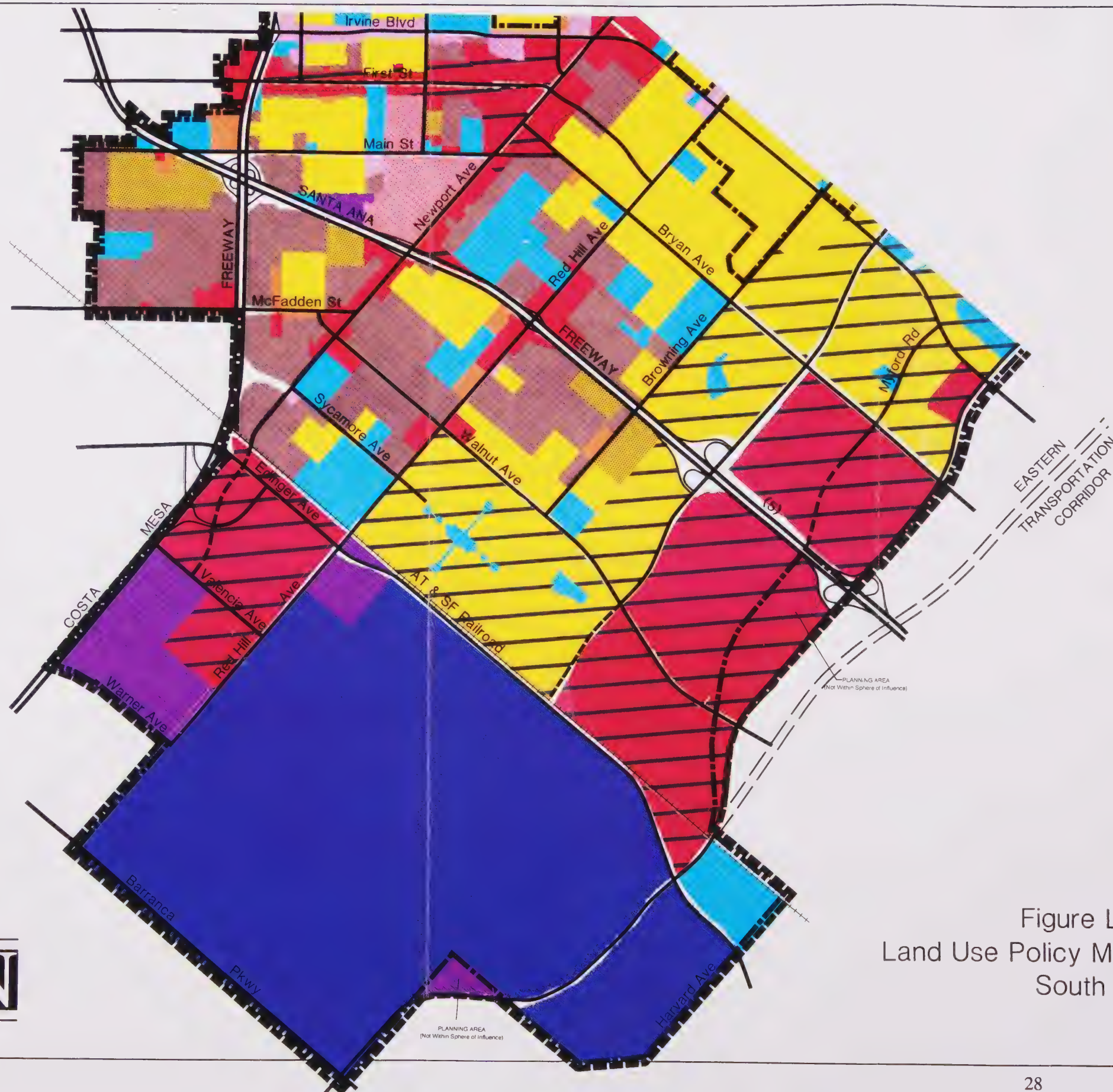


Figure LU-3
Land Use Policy Map -
South Half

Table LU-2
Development Intensity/Density Standards

MAJOR LAND USE GROUPINGS	MAXIMUM DWELLING UNITS PER ACRE OR MAXIMUM FLOOR AREA RATIO (a)	EFFECTIVE DWELLING UNITS PER ACRE OR AVERAGE FLOOR AREA RATIO (b)	LAND USE DESIGNATION AND SUMMARY DESCRIPTION
RESIDENTIAL	1-7	5.61	LOW DENSITY RESIDENTIAL - Detached single family dwellings which allows up to 7 dwelling units per net acre with an average of 3.25 persons per dwelling unit.
	8-15	15.00	MEDIUM DENSITY RESIDENTIAL - Multi-family dwellings including duplexes, condominiums, townhomes, and apartments. Allows up to 15 dwelling units per net acre with an average of 2.73 persons per dwelling unit.
	15-25	21.53	HIGH DENSITY RESIDENTIAL - Multi-family dwellings including duplexes, condominiums, townhomes, and apartments. Allows up to 25 dwelling units per net acre with an average of 2.15 persons per dwelling unit.
	1-10	6.31	MOBILE HOME PARK - Mobile Home Park development which allows up to 10 dwelling units per acre with an average of 2.15 persons per dwelling unit.
COMMERCIAL	0.5:1	0.4:1	COMMUNITY COMMERCIAL - Includes retail, professional office, and service-oriented business activities serving a community-wide area and population.
	1.0:1	0.5:1	OLD TOWN COMMERCIAL - Includes retail, professional office, and service-oriented business activities serving Old Town and surrounding areas. (May also include high density residential).
	0.8:1	0.4:1	PROFESSIONAL OFFICE - Primarily single tenant or multi-tenant offices that include legal and medical services, financial institutions, corporate and government offices, and other supporting uses.
INDUSTRIAL	0.6:1	0.5:1	INDUSTRIAL - A mix of industrial and office uses such as wholesale businesses, light manufacturing, storage, distribution and sales, research and development laboratories, and service commercial business.
PUBLIC	0.6:1	0.2:1	PUBLIC/INSTITUTIONAL - Public and private uses such as schools, churches, City Hall, flood control channels, reservoirs, communication, utility substations, and recreation/open spaces such as parks, golf courses, and designated open spaces.
	0.25:1	0.1:1	MILITARY - Federal government military operations.
PLANNED COMMUNITY	(c)	(c)	PC RESIDENTIAL - Includes low, medium, and high density residential described above with respective averages of 3.15, 2.45, and 2.05 persons per dwelling unit.
	1.5:1	0.4:1	PC COMMERCIAL/BUSINESS - Mix of commercial and office uses such as hotel/motels, commercial centers, research and development, and professional offices.
	0.6:1	0.2:1	PC PUBLIC/INSTITUTIONAL - Same as Public/Institutional above.
TRANSPOR- TATION	—	—	TRANSPORTATION - Consists of major and primary arterial roadways and railroads.

(a) Maximum allowable level of development standard for individual parcels of land.

(b) Assumed overall standard level of development. Since the development which has occurred to date has not reached the maximum allowed level of density or intensity, future development is expected to be less than the maximum. Therefore, an effective level of density/intensity is used when projecting total future dwelling units/population for residential development and future square footage for non-residential development where floor area is used as a measurement of building intensity.

(c) Maximum density in dwelling units per acre is prescribed by individual Planned Community documents. Effective dwelling units per acre for low, medium, and high density residential is 4.485, 11.834, and 17.39, respectively.

commercial designations, one industrial, one public/ institutional, and a military designation are included. A planned community designation, which includes residential, commercial/business, and public institutional components, is also provided. Major transportation facilities are included in a single transportation category.

Land Use Intensity/Density

State General Plan law requires that the Land Use Element indicate the maximum intensities/densities permitted within the Land Use Plan. The land use designations contained in this element and shown on the Land Use Plan Policy Map are described in this way. Table LU-2 lists each of the land use designations shown on the Land Use Plan and provides a corresponding indication of maximum intensity/density of development on that parcel. Maximum allowable development on individual parcels of land is to be governed by these measures of intensity or density. The table also includes the expected or effective overall levels of development within each land use designation within the planning area. These standard levels of development represent an anticipated intensity/density and are, therefore, less than the absolute maximum allowed for an individual parcel of land. For various reasons, many parcels in the City have not been developed to their maximum intensity/density and, in the future, maximum development as described in this Element can be expected to occur only on a limited number of parcels.

Future development on a city-wide basis is expected to occur at the effective level of intensity/density stated in Table LU-2. Development at an intensity or density between the effective and maximum levels can occur only where projects offer exceptional design quality or important public amenities or benefits above the standards required by the City's Zoning Ordinance and other regulatory documents. For the residential land use designations, projects are expected to build to a density at least as high as the lowest density allowed by their respective designations. The residential categories also include an average number of persons per dwelling unit standard as a basis for determining the population density.

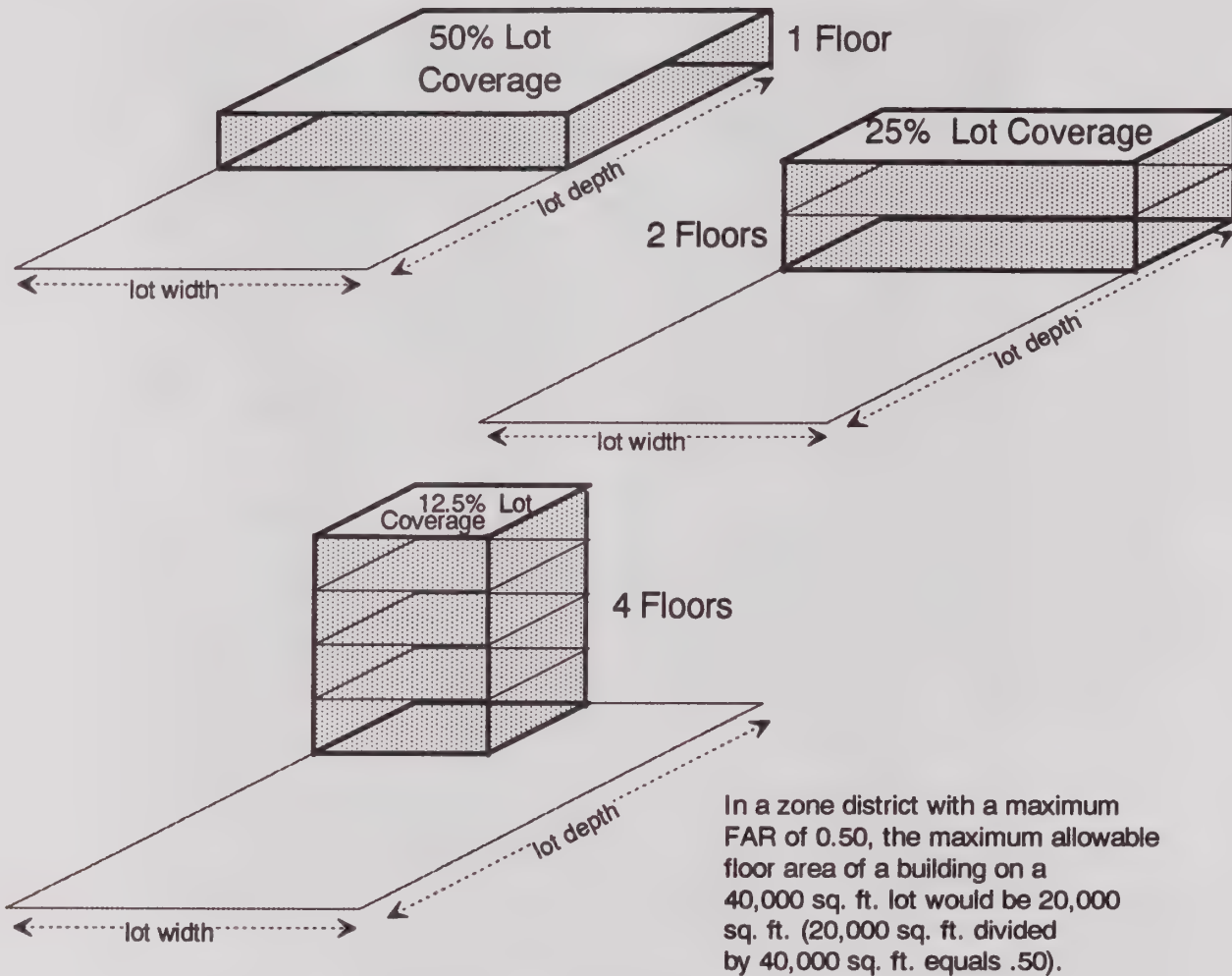
A number of terms are used to define the land use designations or categories described in this element. The term "intensity" refers to the degree of development based on building characteristics such as height, bulk, floor area ratio and/or

percent of lot coverage. Intensity is most often used to describe non-residential development levels, but, in a broader sense, is used to express overall levels of all development types. The overall intensity of development within the Tustin Planning Area is similar to other urbanized areas of Orange County, such as Anaheim, Orange, Irvine and Newport Beach.

For most non-residential land use categories (commercial, industrial, public/institutional facilities), the measure of intensity known as "floor area ratio" (FAR) provides the most convenient method of describing development levels. Simply stated, the floor area ratio is the relationship of total gross floor area of all buildings on a lot to the total land area of that lot expressed as a ratio. For example, a 20,000 square foot building on a 40,000 square foot lot yields an FAR of .50:1 as illustrated in Figure LU-4. The FAR describes use intensity on a lot, but not the actual building height, bulk or coverage. As Figure LU-4 shows, the .50:1 FAR can yield a building of one story in height covering one half of the lot area, or a taller building which covers less of the lot and provides more open space.

The term "density", in a land use context, is a measure of the population and residential development capacity of the land. Density is described in terms of dwelling units per net acre (du/net ac); thus, the density of a residential development of 100 dwelling units occupying 20 net acres of land is 5.0 du/net ac. Differences in residential land use types generally produce a corresponding difference in the number of persons occupying a given type of unit (i.e., single family residential uses generally house more persons than multiple family units). For purposes of calculating population intensity, an average number of persons per dwelling unit for certain residential land use designations is assumed as shown in Table LU-2 and is described in each land use description beginning on page 33.

Possible Building Configurations for 0.50 FAR



NOTE: Variations may occur if upper floors are stepped back from ground level lot coverage.

$$\text{Floor Area Ratio (FAR)} = \frac{\text{Gross Building Area (All Floors)}}{\text{Lot Area}}$$

Descriptions of each of the land use designations shown on the Land Use Policy Map (Figures LU-1, LU-2, and LU-3 are provided in the following section to delineate the general types of uses allowed and their corresponding intensities or densities.

Residential Designations

Low Density Residential: The Low Density Residential land use designation provides for the development of low density single family dwellings and accessory buildings. Uses such as second single family structures on large lots, guest rooms, public/institutional facilities, churches, schools, large family day care homes, and others, which are determined to be compatible with, and oriented toward serving the needs of low density detached single family neighborhoods may also be allowed.

This designation allows a maximum of seven single family units per net acre of land. Areas within the designation can be regulated in a Zoning Ordinance with lower densities to reflect the existing character. Development in this land use category should maintain a low density character with building heights generally not exceeding 30 feet.

Medium Density Residential: The Medium Density Residential land use designation provides for the development of a wide range of living accommodations including typical single family units, patio homes, multiple family dwellings such as duplexes, apartments, condominiums, townhomes, cooperatives, and community apartments. Uses such as public/institutional facilities, churches, schools, and others, which are determined to be compatible with and oriented toward serving the needs of medium density neighborhoods may also be allowed.

This designation allows a maximum of 15 dwelling units per net acre of land. Building heights should generally not exceed 35 feet. The average population for this residential designation is approximately 2.73 persons per dwelling unit which represents a population density range for this land use designation of 2 to 41 persons per acre. The maximum density of this land use category may be exceeded to complement General Plan Housing Element Policy, only as approved by the City Council, in accordance with the density bonus provisions of Section 65915 of the California Government Code.

High Density Residential: The High Density Residential land use designation provides for the development of a wide range of

living accommodations including single family units, multiple family dwellings such as, apartments, condominiums, townhomes, cooperatives, and community apartments. Uses such as public/institutional facilities, churches, schools, and others, which are determined to be compatible with and oriented toward serving the needs of high density neighborhoods may also be allowed.

This designation allows a maximum of 25 dwelling units per net acre of land. The intent of this land use category is to maintain existing developed multiple family areas while also providing opportunities for recycling of other neighborhoods where maintenance efforts would produce minimal results. Building heights should generally not exceed 35 feet. The average population for this residential designation is approximately 2.15 persons per dwelling unit which represents a population density range of 2 to 54 persons per acre. The maximum density of this land use category may be exceeded to complement General Plan Housing Element Policy, only as approved by the City Council, in accordance with the density bonus provisions of Section 65915 of the California Government Code.

Mobile Home Park: The Mobile Home Park land use designation provides for the development of mobile home parks subject to certain zoning restrictions. This designation allows a maximum of 10 dwelling units per net acre of land with an average population of approximately 2.15 persons per dwelling unit which represents a population density range for this land use designation of 2 to 21 persons per acre.

Commercial Designations

Community Commercial: The Community Commercial designation is characterized by a variety of miscellaneous retail, professional office, and service-oriented business activities, many of which, are highway oriented and serve a community-wide area and population. Community Commercial uses serve local, as well as broad market areas and generally include professional and business offices, retail and commercial services, child care, restaurants, and public/institutional facilities, along with larger-scale indoor commercial uses such as department stores, furniture and appliance outlets, theaters and entertainment uses. Site development standards for this land use category should encourage large projects and provide for adequate setbacks, parking, landscaping, buffering from residential land use areas and other features which will create well designed, efficient and attractive projects. The standard intensity of development is a

floor area ratio of 0.4:1 and the maximum intensity of development is a floor area ratio of 0.5:1.

Old Town Commercial: The Old Town Commercial designation includes retail, professional office, and service-oriented business activities which serve Old Town and surrounding areas. Old Town Commercial use generally include professional and business offices, retail and commercial services, restaurants, and public/institutional facilities, along with larger scale indoor uses such as department stores, furniture and appliance outlets, theaters and entertainment uses. Other uses (such as residential uses) which support this land use may be permitted subject to the discretion of the City. The standard intensity of development is a floor area ratio of 0.5:1 and the maximum intensity of development is a floor area ratio of 1.0:1. To ensure compatibility of land uses permitted within the classification, with the character of surrounding development and within a development area itself, location, land use type, density and building intensity standards will be specifically be governed by Planned Community District provisions or adoption of a Specific Plan as authorized by the California Government Code. This includes the maximum densities for any residential uses determined desirable by the Planning Commission or City Council, as applicable. The overall population density range for residential use within the Old Town Commercial designation is 2 to 54 persons per acre.

Professional Office: The Professional Office designation provides areas of development of primarily professional offices and other supporting uses. Permitted uses include professional, legal, medical, general financial, administrative, corporate and general offices, business support services, financial, insurance and real estate services and supportive commercial uses such as restaurants, medical services, public service uses, financial institution, cultural and public/institutional facilities, and similar uses which together constitute concentrations of office employment or community activity. Also included are small convenience or service commercial activities intended to meet the needs of the on-site employee population. The standard intensity of development is a floor area ratio of 0.4:1 and the maximum intensity of development is a floor area ratio of 0.8:1.

Industrial Designation

Industrial: The industrial designation is designed to accommodate a variety of light industrial uses which are non-

polluting and which can co-exist with surrounding land uses and which do not, in their maintenance, assembly, manufacture or plant operation create smoke, gas, dust, sound, vibration, soot or glare to any degree which might be obnoxious or offensive to persons residing or conducting business in the City. Permitted uses would include but not be limited to wholesale businesses, light manufacturing and processing, distribution and sales, warehousing and storage, research and development uses, light industrial business parks and related uses. Obnoxious, heavy industrial uses are not permitted in this land use category. The standard intensity of development is a floor area ratio of 0.5:1 and the maximum intensity of development is a floor area ratio of 0.6:1. Standards incorporated in the Zoning Ordinance control the development of environmentally compatible industries within this land use category. Special standards including the provision of setbacks, screening barriers, berms, generous landscaping and low profile buildings should be applied.

Public Designations

Public/Institutional: The Public/Institutional designation includes a wide range of public and quasi-public uses distributed throughout the community such as schools, churches, child care centers, transportation facilities, public buildings and facilities, public utilities, libraries, museums, art galleries, community theaters, hospitals, cultural and recreational activities, community recreational facilities, and parks. Certain public institutional uses may be permitted within other land use designations when determined appropriate. In addition, land uses which support and are specifically related to the function of the primary institutional use may also be permitted. These support uses may include residential (for purposes of housing persons related to an institutional use), retail and service commercial, and industrial uses (e.g., warehousing for a city yard facility). The standard intensity of development is a floor area ratio of 0.2:1 and the maximum intensity of development is a floor area ratio of 0.6:1.

Military: The Military designation refers exclusively to the Marine Corps Air Station. The standard intensity of development is a floor area ratio of 0.1:1 and the maximum intensity of development floor area ratio is 0.25:1. Because of the environmental and infrastructure uses associated with closure of the base, any reuse of the entire military facility will require a General Plan amendment as well as all proposed uses being governed by Planned Community District provisions or adoption

of a Specific Plan as authorized by the California Government Code.

Planned Community (PC) Designations

PC Residential: The PC Residential land use designation allows for the diversification in the relationships of various densities, building and open spaces. The land use designation recognizes that mixed and integrated uses can be made to be compatible and provides for the development of low, medium and high density residential development within a wide range of living accommodations. Single family dwellings and multi-family dwellings such as duplexes, condominiums, townhomes, apartments, cooperatives, community apartments and uses such as public/institutional facilities, churches, schools, large family day care facilities and others which are determined to be compatible with and oriented toward serving the needs of residential neighborhoods may also be allowed. The actual mechanism for defining location, density range and other building intensity standards will specifically be governed by Planned Community District provisions or adoption of a Specific Plan as authorized by the California Government Code. The average population is approximately 3.03 persons per dwelling unit for low density development representing a population density range of 2 to 21 persons per acre; 2.45 persons per dwelling unit for medium density development representing a population density range of 2 to 37 persons per acre; and 2.05 persons per dwelling unit for high density development representing a population density range of 2 to 51 persons per acre.

PC Commercial/Business: The PC Commercial/Business designation provides opportunities for a mixture of all those activities permitted within the Community Commercial, Professional Office, and Industrial land use designations. To ensure compatibility of land uses permitted within the classification, with the character of surrounding development and within a development area itself, location, land use type, density and building intensity standards will be specifically be governed by Planned Community District provisions or adoption of a Specific Plan as authorized by the California Government Code. The Planned Community Commercial designation may also permit other uses (such as residential uses) which support this land use designation. The standard intensity of development is a floor area ratio of 0.4:1 and the maximum intensity of development is a floor area ratio of 1.5:1. The overall

population density range for residential use within the PC Business/Commercial designation is 2 to 54 persons per acre.

PC Public/Institutional: The PC Public/Institutional designation includes a wide range of public and quasi-public uses distributed throughout the community such as schools, churches, child care centers, transportation facilities, government offices and facilities, public utilities, libraries, museums, art galleries, community theaters, hospitals, cultural and recreational activities including golf course/driving ranges, community recreational facilities, public parklands and indoor and outdoor sports/athletic facilities. To ensure compatibility of land uses permitted within the classification, with the character of surrounding development and within a development area itself, location, land use type, density and building intensity standards will be specifically be governed by Planned Community District provisions or adoption of a Specific Plan as authorized by the California Government Code. The Planned Community Public/Institutional designation may also permit other uses (such as residential for purposes of housing persons related to an institutional use) which support this land use designation. The standard intensity of development is a floor area ratio of 0.2:1 and the maximum intensity of development is a floor area ratio of 0.6:1. The overall population density range for residential use within the PC Public/Institutional designation is 2 to 54 persons per acre.

Transportation Designation

Transportation Corridor: The Transportation Corridor designation applies to the land within the corridors for the Santa Ana Freeway (Interstate 5), the Costa Mesa Freeway (State Route 55), the Atchison, Topeka and Santa Fe railway, and Circulation Element roadways. Lands within these corridors are reserved for transportation purposes as the primary use. Secondary uses, such as open space linkages and landscaped areas, public and private parking areas, and other transportation-related activities and facilities are also allowed.

IMPLICATIONS OF THE LAND USE PLAN

The implementation of the Land Use Plan contained in this Element will permit additional development consistent with other General Plan goals and objectives. Table LU-3

summarizes the distribution of acreage within each land use designation in the City of Tustin and within the City's Sphere of Influence.

Figure LU-5 delineates the boundaries of seven planning sub-areas within the Tustin Planning Area, while Table LU-4 provides a summary of land use distribution within each sub-area. Figure LU-5 delineates the boundaries of these sub-areas.

A Land Use Plan has definitive implications on the City's capacity to support a given number of people. The development capacity describes the level of development that could occur within the parameters set by the density/intensity standards of the Land Use Plan.

There are two concepts of development capacity. One is "maximum development capacity" which assumes total development of the Plan on all parcels of land at the highest permitted densities/intensities. This total build-out at the maximum permitted density or intensity standard for a land use designation is not expected to occur. Factors such as environmental constraints, existing land uses, the choice of a builder to build to less than maximum permitted density/intensity all have an impact on the level or intensity of development within a particular land use designation. However, a maximum level of development may occur on individual parcels of land where minimal constraints exist or where a project's exceptional design quality or important public amenities/benefits warrant development at maximum density/intensity.

The second concept of development capacity is referred to as "effective development capacity" which assumes that under realistic circumstances, all development will not be at maximum density or intensity based on appraisal of development constraints in the City which would restrict development to less than that shown by the maximum density/ intensity of the Land Use Plan. For example, in some zoning districts, the level of development permitted may be based on the size of a lot; smaller lots may only be authorized to develop at densities/

Table LU-3
Future Land Use Density/Intensity and Population Capacity of the Land Use Plan

Major Land Use Groupings and Land Use Designations	Gross Acres Incorporated Area	Gross Acres Unincorporated Area	Gross Acres Total Planning Area (A)	Dwelling Units Incorporated Area (B)	Dwelling Units Unincorporated Area (C)	Dwelling Units Total Planning Area (D)	Square Footage Incorporated Area (000's) (D)	Square Footage Unincorporated Area (000's) (D)	Square Footage Total Planning Area (000's) (D)	Average Persons Per Dwelling Unit	POPULATION						
	Estimated Population Incorporated Area	Estimated Population Unincorporated Area	Estimated Population Total Planning Area	Estimated Population Incorporated Area Low (E)	Estimated Population High (E)	Maximum Estimated Population Capacity Incorporated Area (G)	Maximum Estimated Population Capacity Total Planning Area (H)										
Residential																	
Low Density Residential (1-7 du/ac)	779.1	3,221.7	4,000.8	3,501	6,832	10,333				3.25	11,378	22,203	33,581	10,809	11,947	13,693	45,306
Medium Density Residential (8-15 du/ac)	35.8	0.0	35.8	430	0	430				2.73	1,174	0	1,174	1,115	1,232	1,069	1,069
High Density Residential (15-25 du/ac)	618.5	0.0	618.5	10,656	0	10,655				2.15	22,909	0	22,909	21,764	24,055	23,973	23,973
Mobile Home Park (1-10 du/ac)	84.7	0.0	84.7	428	0	428				2.15	919	0	919	873	965	1,065	1,065
Commercial																	
Community Commercial	168.7	0.0	168.7				2,372	0	2,372								
Old Town Commercial	72.0	0.0	72.0	(F)		(F)	1,255	0	1,255	(F)	(F)		(F)				
Professional Office	55.6	0.0	55.6				775	0	775								
Industrial																	
Industrial	165.7	15.0	180.7				2,887	261	3,149								
Public																	
Public/Institutional	333.0	165.7	498.7				2,321	1,155	3,476								
Military (Residential at 8-15 du/ac)	1,497.7	0.0	1,497.7	1,859 (J)	0	1,859 (J)	5,219	0	5,219	2.73	5,075	0	5,075	5,075	5,075	5,075	5,075
Planned Community (PC)																	
PC Low Density Residential	806.7	331.4	1,138.1	2,894 (I)	946	3,841				3.15	9,120	2,983	12,102	8,664	9,575	9,488	12,303
PC Medium Density Residential	449.7	58.2	507.9	4,257	454	4,711				2.45	10,431	1,112	11,543	9,909	10,952	11,388	12,614
PC High Density Residential	258.3	3.0	261.3	3,593	41	3,634				2.05	7,367	84	7,451	6,998	7,735	7,790	7,879
PC Commercial/Business	892.5	85.9	978.4				12,441	1,197	13,638								
PC Public/Institutional	405.9	20.8	426.7				2,829	145	2,974								
Transportation																	
Transportation	528.1	63.3	591.4														
Total	7,152.0	3,965.0	11,117.0	27,618	8,273	35,891	30,099	2,759	32,857		68,372	26,381	94,754	65,207	71,537	73,542	109,284

A For purposes of establishing density/intensity by land use designation, the gross acreage for residential and non-residential land use is converted to net acreage through a general reduction of the gross acreage by 20% to account for the land area devoted to roadways.

B Dwelling units in the incorporated area are generally based on residential designation averages of 5.617 du/ac for Low Density Residential, 15 du/ac for Medium Density Residential, 21.535 du/ac for High Density Residential, 6.31 du/ac for Mobile Home Park, and 20.5 for PC High Density Residential not in East Tustin.

C Dwelling units in the unincorporated area are generally based on residential designation averages of 2.65 du/ac for Low Density Residential, 3.57 du/ac for PC Low Density Residential, 9.75 du/ac for PC Medium Density, and 17.0 du/ac for High Density Residential. The difference in number of dwelling units in the unincorporated area between Tables 3-2 and 3-1 is attributable to estimating error and variation between data sources. For General Plan purposes, the numbers in both tables are considered equivalent.

D Square footage for non-residential designations is based on the standard intensity (FAR) for the designation represented.

E A population range for the city and planning area is estimated to account for variation in projected persons per dwelling unit using 95 percent of the average persons per dwelling unit for the bottom of the range and 105 percent of the average persons per dwelling unit for the top of the range.

F 291 dwelling units in the Old Town Commercial area are included in the High Density Residential calculation of dwelling units and population.

G Maximum population capacity calculated by adding one dwelling unit per acre to the average dwelling unit per acre factor described in Note B above with the exception of High Density Residential at the 25 du/ac maximum.

H Maximum population capacity calculated by adding one dwelling unit per acre to the average dwelling unit per acre factor described in Note B and Note C above with the exception of High Density Residential at the 25 du/ac maximum.

I PC Low Density Residential contains 1,603 dwelling units; PC Medium Density Residential contains 3,609 dwelling units and PC High Density contains 3,184 dwelling units in East Tustin Planned Community. 409 PC High Density and 126 PC Medium Density Residential dwelling units are outside of East Tustin. 1,291 PC Low Density Residential dwelling units are in the Tustin Meadows and Peppertree Planned Communities. 522 PC Medium Density Residential dwelling units are in the Planned Community of Laurelwood. All of the PC Residential dwelling unit figures have been provided by the City of Tustin.

J The Military housing estimate of 1,859 dwelling units in the table is based on 985 family housing units and additional barrack units for approximately 2,500 Marine Corps personnel on MCAS Tustin within the Tustin Planning Area. The barrack units are not occupied at all times and fluctuate according to the number of base personnel. Military housing is specifically addressed in the General Plan Housing Element.



SOURCE: City of Tustin

TUSTIN
GENERAL PLAN

Figure LU-5
Planning Subareas

Table LU-4
Planned Land Use Composition
Summary for Planning Subareas

Major Land Use Groupings and Land Use Designations	Gross Acres of Land by Subarea							Total by Land Use Designation
	1	2	3	4	5	6	7	
Residential								
Low Density Residential (1-7 du/ac)	422.9	120.3		12.9	20.0	221.1	3,203.6	4,000.8
Medium Density Residential (8-15 du/ac)	4.8	29.5				1.5		35.8
High Density Residential (15-25 du/ac)	68.2	415.6		0.6		134.1		618.5
Mobile Home Park (1-10 du/ac)	3.5	62.8		18.4				84.7
Commercial								
Community Commercial	33.2	60.0				75.5		168.7
Old Town Commercial	72.0							72.0
Professional Office	48.5	1.9				5.2		55.6
Industrial								
Industrial	11.0		169.7					180.7
Public								
Public/Institutional	68.4	94.2		64.5		105.9	165.7	498.7
Military			1,497.7					1,497.7
Planned Community (PC)								
PC Residential	20.2	0.0		331.5	1,161.8	1.8	392.0	1,907.3
PC Commercial/Business	136.6		188.6	403.0	224.3	19.3	6.6	978.4
PC Public/Institutional					405.9		20.8	426.7
Transportation								
Transportation	106.3	97.4	54.1	81.1	181.5	30.7	40.3	591.4
Total by Subarea	995.6	881.7	1,910.1	912.0	1,993.5	595.1	3,829.0	11,117.0

intensities substantially less than permitted by a maximum density/intensity standard.

Table LU-3 provides a breakdown of land uses within the City and total Planning area for purposes of identifying the effective development capacity of the Land Use Plan for both dwelling units/population and square footage of non-residential uses. In arriving at effective development capacity for population growth and the number of units possible under build-out conditions, the effective permitted units by each specific residential land use designation was multiplied by the average household size estimated for each residential land use designation.

For non-residential uses, the effective level of intensity (the average floor area factor shown in LU-2) was used to determine the level of expected future square footage of development.

The degree to which plan capacity exceeds projected population is referred to as "overage". Some overage is desirable to make allowance for inevitable small pockets of undevelopable land, to allow for difficulty in recognizing development trends in completely vacant areas, to allow for an unforeseen need for public utilities, and to recognize that some owners will maintain their land in an undeveloped state beyond the time span of the Plan. The Southern California Association of Governments (SCAG) has recommended that plan capacity overage not exceed approximately 20 to 25 percent of the projected population. The measurement of overage is accomplished by dividing the maximum population capacity of the plan by the projected population. For the Tustin Planning Area, the maximum population capacity of the Plan is 110,759 and the projected population is 94,754 resulting in an overage of approximately 17 percent.

SPECIAL MANAGEMENT AREAS

Certain areas within the planning area have special characteristics or unique properties which require continuous City management to ensure that City policy is implemented and desired results are achieved. These "Special Management Areas" (SMAs) are regulated in different ways by the City and other public agencies having specific responsibilities for methods and timing of land development. For these reasons, two Special Management Area Policy Maps have been prepared to identify these areas consistent with Land Use Element goals and policies

and related policies, contained in other General Plan elements which impact land use decisions. Special standards for development in Special Management Areas are applicable regardless of other land use descriptions on a property. Figures LU-6 and LU-7 delineate the boundaries of Special Management Areas in the Tustin planning area.

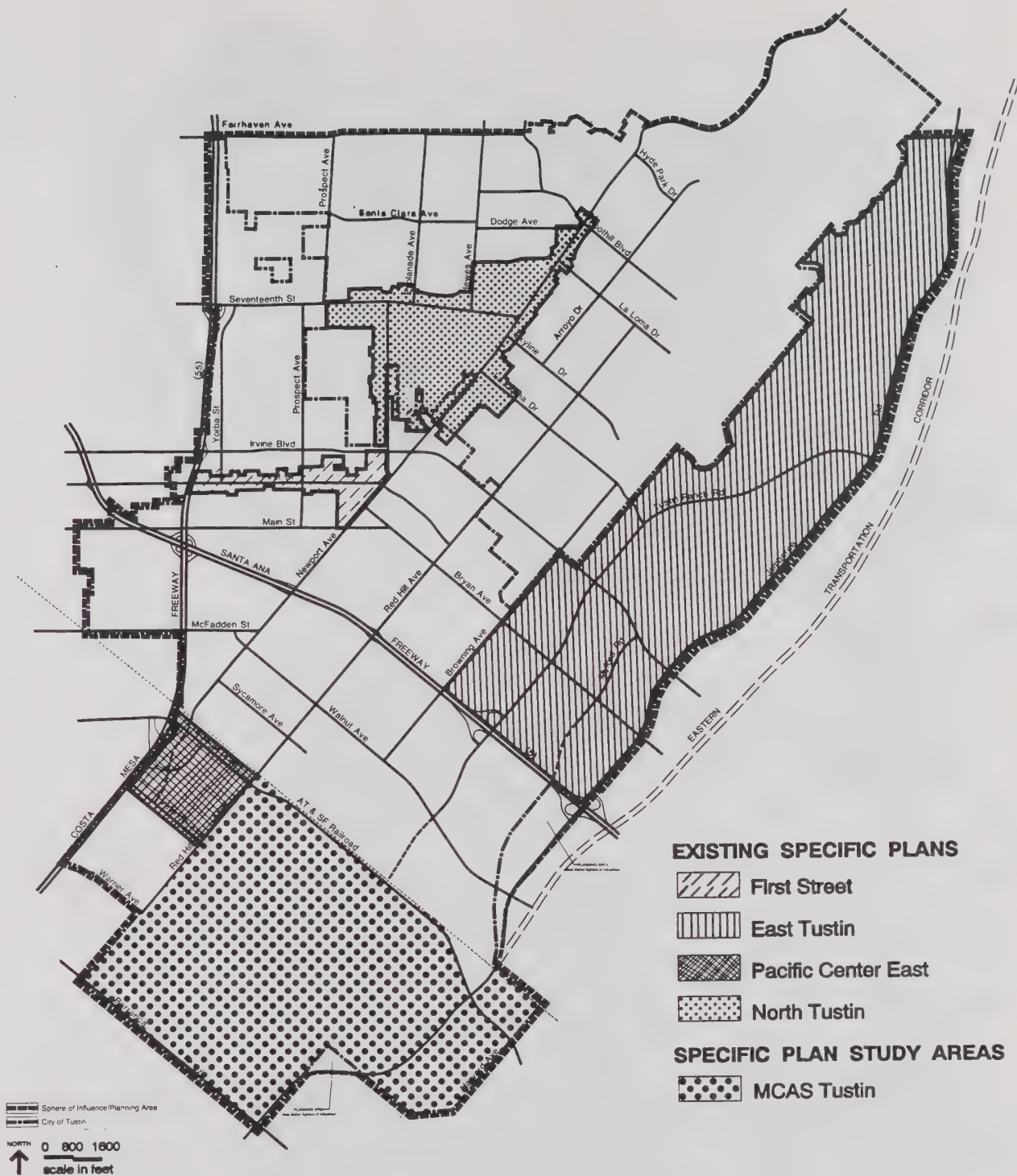
Existing Specific Plans

Specific plans are designed to implement General Plan goals and policies by desegregating land uses, densities, developments and design standards. Adopted specific plans within the planning area include: East Tustin, Pacific Center East, First Street, and North Tustin.

East Tustin Specific Plan: The East Tustin Specific Plan area represents a portion of the Irvine Company property which was annexed to the City of Tustin incrementally in 1977, 1980, and 1981 and now forms a portion of the City's eastern boundary. The Plan encompasses 1,746 acres and represents the last significant area remaining to be developed in the City. The entire Specific Plan area has been subdivided, with approximately half of the total acreage currently developed.

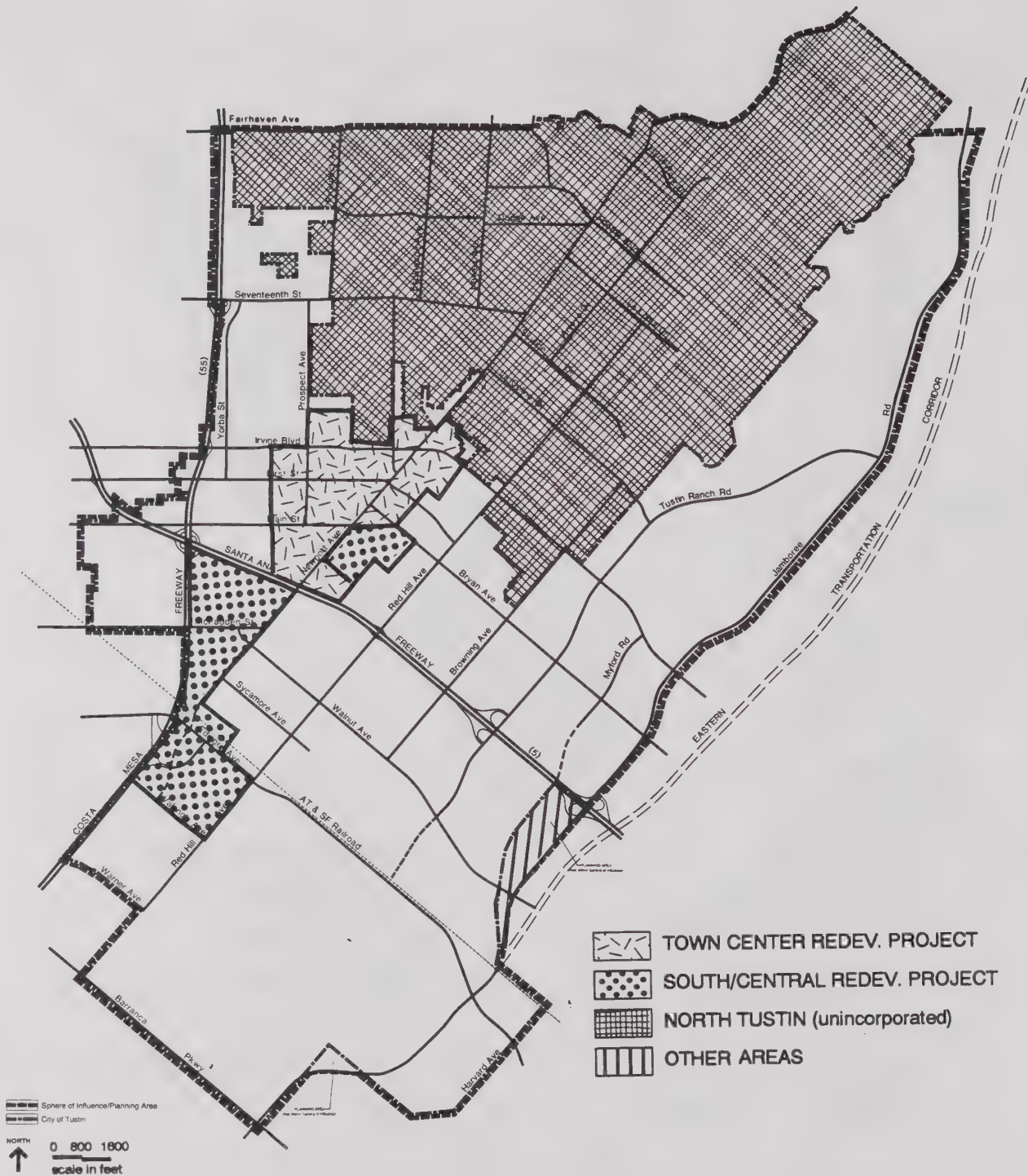
The overall land use concept of the Specific Plan provides for a planned community which is compatible with and complementary to the land use characteristics of the local area, and is also sensitive to environmental resources. A variety of uses are permitted in the Specific Plan including residential uses, commercial uses, and public uses. All development activities within this area of the City are subject to provisions of the East Tustin Specific Plan. A more lengthy discussion of the plan can be found in the Land Use Technical Memorandum.

Pacific Center East Specific Plan: The Pacific Center East Specific Plan covers a 126 acre currently underutilized commercial/light industrial area located in the southern portion of the City immediately adjacent the SR-55 freeway corridor. The overall concept for the Pacific Center East Plan is intended to provide for a planned business park which encourages a variety of office, commercial, light industrial and research and development uses. More intensive land uses of up to twelve stories in height are to be concentrated at the southwesterly portion of the Plan area, with potential development intensity decreasing to one and two stories in height towards the north and northwesterly portion of the edges of the Plan area in



TUSTIN
GENERAL PLAN

Figure LU-6
Special Management Areas
Specific Plans



SOURCE: City of Tustin - An Update on Redevelopment, March 1990

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GENERAL PLAN

Figure LU-7
Special Management Areas
Redevelopment Project Areas/
North Tustin/Other Areas

proximity to existing residential land uses. All development activities within this area of the City are subject to provisions of the Pacific Center East Specific Plan. A more lengthy discussion of the plan can be found in the Land Use Technical Memorandum.

First Street Specific Plan: The First Street Specific Plan encompasses approximately one mile along the First Street commercial corridor from central Tustin at Newport Avenue to the SR-55 (Costa Mesa) Freeway. This corridor varies in depth on either side of the street from 80 feet in what remains of some old single-family residential lots, to a quarter mile along Newport Avenue where commercial centers have accumulated sites of several acres. While the Plan area is relatively small (approximately 65 acres), it constitutes a major entry into Tustin from the west and provides access to the Old Town Tustin and the Civic Center (via Centennial Way). All development activities within this area of the City are subject to provisions of the First Street Specific Plan. A more lengthy discussion of the plan can be found in the Land Use Technical Memorandum.

North Tustin Specific Plan: The North Tustin Specific Plan applies to portions of the unincorporated area of North Tustin in the general vicinity of 17th Street and Newport Avenue. All development activities within this area of the County are subject to provisions of the North Tustin Specific Plan. A more lengthy discussion of the plan can be found in the Land Use Technical Memorandum.

The North Tustin Specific Plan (NTSP) is a County document presently controlling development under the County's jurisdiction. It was formulated by community consensus in response to a perception that this area forms a buffer zone between commercial development to the south and west and low density residential to the north and east. This General Plan recognizes the continued need for stable specific designation for this sensitive area by requiring that development regulation in this NTSP be utilized in review of any development proposals within this area under the Tustin General Plan. Should the subject area or any part of it be annexed to the City of Tustin, the NTSP document will be revised to reflect the changed jurisdiction and authorities. In the case of ambiguity due to map scale, or other special concerns such as topographic or environmental constraints, the County of Orange's exhibit maps in conjunction with testimony solicited from the surrounding property owners within 300 feet shall be used as evidence in determining the consistency of a proposed development. The

notations on the exhibit are not intended to redefine the land use or other designations as applied to the area, but rather to capture special considerations regarding how they should be applied.

Community Profile Maps show boundary designations that follow topographic or manmade features. Variance from these boundaries will be based on the following standards:

1. The basic character of the area is retained.
2. The project is compatible with the uses identified by the Community Profile for the area.
3. No significant adverse environmental or public service impacts will be created.
4. No precedent is established for development within designated environmentally significant areas.

Examples of qualifying considerations include:

- a. Final project design provides open space equal to or greater than that designated in the Community Profile.
- b. Detailed study identifies significant environmental features unknown or inaccurately identified during planning studies.
- c. Significant public facilities such as parks, bikeways and horse trails are provided which serve to define use areas, but are not otherwise required by the Community Profile.
- d. Expansion or modification of an existing use where impacts are essentially unchanged (e.g., condominium conversion).

Future Specific Plan Study Areas

In order to achieve General Plan goals and objectives, other portions of the planning area may be identified as Specific Plan study areas for specific plans. The most immediate specific plan study area is the approximately 1,500 acres of land within the boundaries of the Tustin Marine Corps Air Station (MCAS), Tustin.

The closure of MCAS, Tustin is expected by July, 1997, and the City believes that all proposed uses on areas of the site to be disposed of by the Military should be governed by Planned Community District provisions and/or adoption of a specific plan. Future use of the base land may include a mixture of commercial, industrial, residential and public development. Reuse of the base property will require substantial investment in infrastructure to support new development, and the possible preparation of a specific plan seems like the most appropriate planning approach to ensure effective use of this important land resource. Although MCAS Tustin in the next area anticipated for inclusion in a specific plan, other properties within the planning area may also be identified as appropriate specific plan study areas in the future. If specific plans are adopted in these areas, amendment to the Special Management Areas Policy Maps is not necessary.

Redevelopment Project Areas

State Redevelopment Law provides the mechanism whereby cities and counties, through the adoption of an ordinance, can establish a redevelopment agency. The Tustin Community Redevelopment Agency was created in 1976 and is made up of the City Council who are elected at large by popular vote. Redevelopment law enables the Agency to undertake community projects designed to improve certain areas within the City which have suffered economic decline, deterioration of improvements, or which have been unable to attract and promote new private investments to enhance the quality of life in the area. State law provides the Agency with broad governmental functions and authority to facilitate revitalization including but not limited to: issuance of bonds; the right to acquire, sell, rehabilitate, develop, administer or lease property; and the right to demolish buildings, clear land, and construct public improvements and infrastructure. State Law also provides various means of financing redevelopment implementation, the most useful of which is tax increment financing. Tustin has two redevelopment project

areas: Town Center and South/Central which are shown on Figure LU-7. All development within either Redevelopment Project area is subject to review of design and analysis of conformity with each redevelopment plan by the Redevelopment Agency prior to issuance of building permits.

North Tustin Area (outside of North Tustin Specific Plan)

The unincorporated portion of the planning area is comprised of the North Tustin area. These areas are included in the City's planning area because they relate to the long range planning efforts undertaken by the City. The North Tustin area lies within the City's Sphere of Influence (SOI) and portions or all of this area could potentially be annexed to Tustin within the next 20 years.

Prior to annexing any unincorporated land, a zoning and General Plan land use analysis must be conducted to determine whether there is a General Plan or Zoning District in Tustin that is consistent with the Specific Plan land uses. In the event that there is no similar land use designation in Tustin, an appropriate General Plan and Zoning modification will be performed. Until such modifications can be made, an unclassified designation shall apply against such property and provisions of the Zoning Code which apply to the unclassified use category shall apply. This process will ensure that only the land uses identified in the Specific Plan will be implemented upon annexation into the City of Tustin.

The Community Profiles (Component III of the County of Orange Advance Planning Program) will be used to ensure the implementation of the General Plan for the unincorporated area of North Tustin not regulated by the North Tustin Specific Plan. Each community profile as these documents are named, consists of maps, statistical information and proposed land uses for unique geographic areas in the County. The Profiles will be used as follows:

- The Community Profile area is one of the units of analysis which will be used to evaluate infrastructure capabilities as they apply to individual project approvals.

- Any agency with land use decision making authority shall evaluate and consider the Community Profiles and compendium of policies in making Planning Decisions.
- Prior to approval, project (development) proposals shall be found consistent with the Community Profiles by the decision making authority. In cases where inconsistencies exist, they shall be resolved and the Community Profile amended concurrently with processing of the discretionary approval.

In the administration and implementation of the Community Profiles as amended, the Planning Agency has the responsibility to interpret and render findings on consistency of zoning and other land use projects in conformance with the requirements of the Government Code and the policies and guidelines expressed in the General Plan.

Planning Area Not Within Sphere of Influence

The two smaller areas between Myford and Jamboree Road south of the I-5 freeway and in the vicinity of MCAS, Tustin adjacent to the City of Tustin's southeasterly boundary, represent areas that are presently included in the City of Irvine. The two incorporated areas lie either northwest or southwest of the alignment of Jamboree Road which was only recently extended south of Edinger Avenue to Barranca Parkway which will be intersected by the right-of-way for the Eastern Transportation Corridor. The roadway as well as the future proposed corridor will create a traffic corridor that provides a strong potential boundary line between the cities of Tustin and Irvine. At this point, planning by Irvine of these areas could have an impact on Tustin and will be monitored closely.

CITYWIDE URBAN DESIGN

Citywide visual linkages are important in establishing the community's identity. Every community with a reputation as a valued place to live or visit is known for the quality and character of its streets. The pattern of landscape, buildings, sidewalks, lighting and graphics create an image which conveys the personality of the city and the level of pride its citizens take in the community. A specific discussion of the City's present image is included in a separate Urban Design Technical Memorandum.



LAND USE ELEMENT IMPLEMENTATION PROGRAM

Implementation measures for land use policy are organized around the tools available that bear a direct relationship to the realization of land use goals. These tools include the Zoning Code, and Subdivision and Grading ordinances, growth management program, code enforcement, specific plans, and capital improvement programs.

The overall goals of the Land Use Element are intended to achieve balanced development of land uses, compatible land use relationships, and a high quality of development. When implemented, the tools will provide the City with the capability to guide the development and revitalization of the key areas of the City. The City Council, by incorporating the Implementation Program into the General Plan, recognizes the importance of long-range planning considerations in day-to-day decision-making, subject to funding constraints.

ZONING ORDINANCE

1. **Zoning Ordinance:** The principal method by which the City implements land use policy as it regulates the location, type of use, and development character is the Zoning Ordinance. The Zoning Ordinance consists of two components: (1) a map which delineates the boundaries of zoning districts in which similar uses developed or to be developed under similar standards are permitted, and (2) text which explains the purpose of the zoning districts, lists permitted and conditional uses, and standards for development.

The City will review and prepare Zoning Ordinance amendments to achieve consistency as necessary with the policies and standards contained in the General Plan. Adoption of Zoning Ordinance amendments and an associated Zoning Map will provide a primary implementation tool for the Land Use Element. Revisions to the Zoning Ordinance shall include but not be limited to:

- Provision of incentives for lot consolidation and parcel assemblage
- Review and revision of current development standards in the City's Commercial and Industrial Zoning Districts

- Provisions which will provide more sensitive transition such as buffering, landscaping, wall and setbacks between divergent land uses;
- Provision of incentives to encourage integration of retail uses on street level of office projects;
- Provision of incentives to encourage consolidation of parking and driveway accesses between businesses;
- Revisions to encourage elimination of non-conforming uses;
- Revisions to establish special monitoring controls on those uses which include storage, use or transport of hazardous materials;
- Revisions, if necessary, of requirements and standards for multi-family uses;
- Establishment of disincentives for future typical strip center development;
- Potential expansion of the Cultural Resources Overlay District north of First Street to Irvine Boulevard; and
- Consolidation of the City's current commercial districts consistent with the Land Use Plan, and other zoning map and text changes consistent with the Land Use Plan designations contained in the General Plan.

Responsible Agency/Department: Community Development

Funding Source: City General Fund

Time Frame: 1993-1995

Related Land Use Element Policies: 1.1, 1.9-1.11, 2.1-2.4, 2.6, 3.3-3.8, 4.2-4.6, 5.1-5.6, 5.8, 6.2-6.6, 6.8-6.9, 6.12, 7.5, 10.2-10.5, 10.7, 10.8

SUBDIVISION AND GRADING REGULATIONS

2. Subdivision, Grading and Public Improvement: Subdivision regulation is an exercise of the police power of a local jurisdiction to control the manner in which land is divided, while

grading regulation controls the safety and aesthetic components of preparing and modifying landform to accommodate development. Like the Zoning Ordinance, these regulations must be consistent with the General Plan. The City's Subdivision, Grading and Public Improvement ordinances will be reviewed and where necessary amendments recommended to determine if it reflects policy expressed in the Land Use Element.

Responsible Agency/Department: Community Development, Public Works/Engineering

Funding Source: City General Fund

Time Frame: 1993

Related Land Use Element Policies: 3.3-3.6, 8.3-8.8, 9.3-9.9

CODE ENFORCEMENT

3. Enforcement Program: Regulations within the City's Zoning Ordinance and other City ordinances must be enforced to be effective. The City has an active code enforcement program designed to achieve the desired level of regulation and expects to continue that program.

Responsible Agency/Department: Community Development

Funding Source: City General Fund, Redevelopment Agency, Federal and State Grants and Other Sources

Time Frame: Ongoing

Related Land Use Element Policies: 2.3, 4.4-4.6, 5.4, 5.6-5.8

SPECIFIC PLANS

4. Specific Plans: State law authorizes local jurisdictions to adopt specific plans for implementing their general plans in designated areas. The specific plan is intended to provide more precise descriptions of the types of uses permitted, development standards, and public infrastructure improvements for an area.

They provide a mechanism for development of a unified design plan for public and/or private property within the plan area.

Responsible Agency/Department: Community Development

Funding: City/Property Owners/Federal and State Grants

Time Frame: Ongoing

Related Land Use Element Policies: 1.4, 9.1-9.9, 10.1-10.9, 11.1-1.5

5. Special Study Areas: Study and prepare plans and General Plan Amendments which will indicate desirable circulation and infrastructure systems and specific land uses desired within Special Study areas identified on the Land Use Plan.

Responsible Agency/Department: Community Development

Funding Source: City General Fund/Property Owners

Time Frame: Ongoing

Related Land Use Element Policies: 9.1-9.9, 10.1-10.9, 11.1-11.5

REDEVELOPMENT

6. Redevelopment Project Areas: The Tustin Redevelopment Agency, shall continue to implement redevelopment actions within the Town Center and South Central Redevelopment Project Areas to promote revitalization of these areas. The feasibility of creating additional project areas shall also be evaluated as needed to implement General Plan goals and policies.

Responsible Agency/Department: City Manager, Community Development

Funding: Redevelopment Agency tax increment

Time Frame: Ongoing

Related Land Use Element Policies: 5.1-5.5, 7.1, 7.3, 10.1-10.4, 10.8

CAPITAL IMPROVEMENT PROGRAM

7. Overall Capital Improvement Program: The City's Capital Improvement Program (CIP) should be reviewed in relation to the General Plan to ensure that plans for major expenditures are consistent with goals, policies and recommended programs, and the improvements identified in the General Plan are included in the CIP. A finding of consistency with the General Plan must be made for each capital project or expenditure approved. This finding should be included in any actions to approve a budget for a specific improvement, as well as approval of the CIP.

Responsible Agency/Department: Community Development, Public Works/Engineering

Funding: City Capital Improvements, City General Fund, Water Fund, Redevelopment Agency, State and Federal grants, and outside funding sources

Time Frame: Annually

Related Land Use Element Policies: 4.1, 6.1, 6.7, 8.1-8.8

8. Parkland and School Site Dedication: The City will continue to require dedication and/or reservation of parkland and other public facilities (such as school sites), or a fee in lieu of, or a combination of both, as a condition of new residential development consistent with the Subdivision Map Act and the Quimby Act.

Responsible Agency/Department: Community Development, Community Services and Public Works Departments

Funding Source: Property Developer

Time Frame: Ongoing

Related Land Use Element Policies: 2.2, 8.7, 9.2

9. Dedication/Improvements: The City shall continue to require dedication of right-of-way and improvements of streets and infrastructure consistent with the provisions of the Tustin City Code and in concert with other public facility and service providers.

Responsible Agency/Department: Public Works Department

Funding Source: Property Developer

Time Frame: Ongoing

Related Land Use Element Policies: 8.4, 8.5, 8.7, 8.8

10. Urban Design Improvement Program: Tustin's identity as a city can be strengthened by creating strong visual linkages with unifying urban design elements on major street corridors. The Urban Design Technical Memorandum provides specific guidance for this program which includes:

- a. Establishment of landscaped corridors along major roadways including: 1) primary and secondary street and median tree plantings; 2) enhanced landscaping, entrance markers, identity graphics, and accent lighting at City gateways or entrances (along major roadways and at intersections); and 3) City identity graphics signing to mark the locations of civic buildings, parks, recreational facilities, schools, walking/biking paths, special areas such as Old Town, and public parking areas;
- b. Establishment or improvement of circulation linkages among public places including: 1) improvement and completion of walking and biking linkages between public parks and community facilities; 2) use of City identity graphics, street furniture, lighting and other improvements to enhance the walking and biking network; and 3) strengthening existing public places and creating new public places connected by the linkage network.
- c. Preservation and enhancement of historic resources including: 1) use of historic light standards where feasible in Old Town area; and 2) application of the Cultural Resources Overlay District to promote preservation and compatible development and use within the Old Town area.

- d. Establishment of common design features for commercial areas including: 1) consolidation of properties and activities; 2) widening of sidewalks and consistent street plantings; 3) using site planning to minimize driveway openings on major streets, and encourage shared access and circulation between adjacent developments; 4) locating buildings near the public sidewalk with parking to the side or rear of the building; 5) parking areas setback from public sidewalk with buildings or landscaped buffers in between; 6) integrating buildings and outdoor spaces to encourage pedestrian activity; 7) providing architecture, landscaping, and site planning that is complementary to surrounding development; 8) designing larger buildings in a manner that reduces their perceived height and bulk; 9) designing building forms and elevations that create interesting silhouettes, strong shade and shadow patterns and architectural detail; and 10) integrating signage with site design, buildings, and landscaping.

Responsible Agency/Department: Community Development

Funding: City General Fund/Development Exactions/Redevelopment Agency/Water Fund/State and Federal Funds

Time Frame: Ongoing

Related Land Use Element Policies: 1.12, 3.8, 4.2-4.3, 5.3, 5.5, 5.8, 6.1-6.12

11. Beautification Program: Encourage organization and implementation of a city beautification program to assist residents and businesses to improve the physical appearance of their property and build greater pride in the community.

Responsible Agency/Department: Administration, Community Development Department

Funding Source: State and Federal funding sources

Time Frame: 1993

Related Land Use Element Policies: 5.3, 5.4, 5.5, 6.2, 6.5, 6.10, 10.8, 11.2

FISCAL STABILITY

12. Economic Development: Land use activities and development proposals generating long-term fiscal benefits to serve local and visitor needs will be targeted as desirable land uses to attract to the City.

Responsible Agency/Department: City Manager/Community Development

Funding: City General Fund/Business Community and Redevelopment Agency

Time Frame: Ongoing

Related Land Use Element Policies: 1.2-1.3, 1.6-1.8, 3.2, 7.2, 7.4

13. Business Attraction and Retention: Develop and undertake an aggressive marketing effort to attract and retain business in Tustin.

Responsible Agency/Department: Community Development, City Council, Administration, Finance Department

Funding Source: City General Fund, State and Federal funding sources

Time Frame: 1993

Related Land Use Element Policies: 1.2, 1.7, 1.8, 5.1, 7.1, 7.2, 7.3, 7.4

14. Legislation: Support State and Federal legislation which will maintain and expand local financing capabilities in undertaking economic development activities and capital projects.

Responsible Agency/Department: Community Development Department, Public Works Department

Funding Source: City General Fund, State and Federal Funding

Time Frame: Ongoing

Related Land Use Element Policies: 1.9, 5.1, 7.1, 7.3, 8.1, 10.7

15. Annexation Proposal Review: Proposals for annexation of lands within the City's sphere of influence will be reviewed to identify the fiscal implications of such annexations, opportunities for greater efficiency in service delivery, and maintenance of quality of life for Tustin residents.

Responsible Agency/Department: City Manager/Community Development

Funding: City/Annexation Applications

Time Frame: Ongoing

Related Land Use Element Policies: 1.5, 1.13

16. Maintenance of City Revenues:

- a. Monitor expenditures for facilities and services to identify those land uses and developments which impose significant costs on the City
- b. Modify development patterns and standards, if required, to reduce municipal costs
- c. Periodically review user charges and fees for services and utilities to be sure that they are consistent with costs incurred by the City.

Responsible Agency/Department: All City Departments

Funding Source: City General Fund

Time Frame: Ongoing

Related Land Use Element Policies: 8.2, 8.7, 8.8

COOPERATION WITH OTHER GOVERNMENTAL AGENCIES

17. Intergovernmental Cooperation: The City will provide information on public and private development proposals within Tustin to other government agencies and will monitor major

issues under consideration by federal and state and other adjacent local agencies which impact Tustin.

Responsible Agency/Department: Community Development

Funding: All City Departments

Time Frame: Ongoing

Related Land Use Element Policies: 2.5, 3.1, 8.1, 8.2, 8.3

18. Service Coverage: Utilize joint power and mutual aid agreements, wherever possible for the purpose of ensuring adequate municipal service coverage in a more efficient manner and/or at the least possible cost to the City.

Responsible Agency/Department: Police Department, County Fire Department, Public Works Department

Funding Source: City General Fund

Time Frame: Ongoing

Related Policies: 8.1, 8.3

MUNICIPAL SERVICES

19. Level of Service: Establish standards for provisions of municipal services and attempt to maintain such level and/or quality of service throughout the City.

Responsible Agency/Department: All City Departments

Funding Source: City General Fund

Time Frame: Ongoing

Related Land Use Element Policies: 8.1, 8.2, 8.4, 8.5, 8.6

ENVIRONMENTAL COMPATIBILITY

20. Environmental Review: Utilize the site plan and design review process and the California Environmental Quality Act, as applicable, in review of development projects to minimize environmental impacts and promote high quality design and physical appearance, compatible and sensitive to the City's natural resources and availability of municipal services and facilities.

Responsible Agency/Department: Community Development Department

Funding Source: City General Fund/Redevelopment Agency/Developers

Time Frame: Ongoing

Related Land Use Element Policies: 1.1, 3.4, 3.6, 3.7, 4.1, 4.5, 8.1, 8.5, 8.6, 9.5, 9.6, 9.7, 9.8

REHABILITATION

21. Rehabilitation Activities: Through the Community Development Block Grant Program (CDBG), the Housing and the U.S. Department of Urban Development (HUD) provide funds to local governments for funding a wide range of activities. Allocate CDBG funds, where possible, for rehabilitation of older residential and commercial areas within the City.

Responsible Agency/Department: Community Development Department

Funding Source: County of Orange/Federal

Time Frame: Ongoing

Related Land Use Element Policies: 5.3, 5.4, 5.7, 6.10, 10.8

PUBLIC PARTICIPATION/INFORMATION

22. Public Information: Develop and distribute public information brochures which describe current development requirements in the City and also assist the public in understanding general land use planning principles and municipal procedures.

Responsible Agency/Department: Community Development Department

Funding Source: City General Fund

Time Frame: Ongoing

Related Land Use Element Policies: 2.4, 5.6, 6.2

23. Public Hearing and Meetings: The City will allow for public input and provide information through the following techniques including: a) Preparing an annual report on the General Plan to the City Council describing the status of the Plan and progress toward its implementation, and b) Continuing the practice of making presentations and holding informal study sessions and workshops within community organizations and the general public to keep all parties informed of current development activities planned or underway in the City.

Responsible Agency/Department: Community Development Department, City Manager

Funding Source: City General Fund

Time Frame: Ongoing

Related Land Use Element Policies: 2.1, 2.3, 2.4, 7.3

T U S T I N
GENERAL PLAN

Housing Element

T U S T I N
GENERAL PLAN

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INTRODUCTION TO THE HOUSING ELEMENT

The availability of decent housing and a suitable living environment for every family has been of increasing concern to all levels of government. In California, this concern is addressed by the California Government Code which requires that each City adopt a Housing Element as a mandatory part of any adopted General Plan.

While the City of Tustin adopted a Housing Element in 1989 which was approved by the State Department of Housing and Community Development and found in compliance with State law, minor changes to Housing Element requirements prescribed by the State and comprehensive revisions to other General Plan Elements necessitate that the City revise its Housing Element sooner than the normal 5-year cycle to ensure internal consistency.

PURPOSE OF THE HOUSING ELEMENT

The Land Use Element is concerned with housing in a spatial context while the Housing Element identifies housing programs aimed at meeting the identified housing needs of the City's population. Concerns of the Tustin Housing Element include the identification of strategies and programs that focus on 1) housing affordability, 2) rehabilitation of substandard housing, 3) meeting the existing demand for new housing, and 4) conservation of the existing affordable housing stock. The Tustin Housing Technical Memorandum provides background information and acts as a supporting document for the Housing Element.

SCOPE AND CONTENT OF ELEMENT

The State Legislature recognizes the role of the local general plan, and particularly the housing element, in implementing Statewide housing goals to provide decent and sound housing for all persons. Furthermore, the Legislature stresses continuing efforts toward providing affordable housing for all income groups. The major concerns of the Legislature with regard to the preparation of housing elements are:

- Recognition by local governments of their responsibility in contributing to the attainment of State housing goals;
- Preparation and implementation of City and County housing elements which coordinate with State and Federal efforts in achieving State housing goals;
- Participation by local jurisdictions in determining efforts required to attain State housing goals; and
- Cooperation between local governments to address regional housing needs.

The State Department of Housing and Community Development sets forth specific requirements regarding the scope and content of City and county housing elements. Table H-1 summarizes State Housing Element requirements and identifies the applicable sections of the Tustin Housing Element and Housing Technical Memorandum where these requirements are addressed.

In keeping with the purpose and intent of State Housing Element regulations, the Housing Element assesses current and forecasted housing needs and constraints to meet these needs, establishes goals and policies to guide public action and identifies a housing program.

RELATIONSHIP TO OTHER GENERAL PLAN ELEMENTS

The preparation of the City's Housing Element is guided by and must conform with Section 65580 et al of the California Government Code. In the introduction of these Government Code sections, the Legislature establishes a policy that the availability of housing in a suitable environment is of vital state-wide importance, and a priority of the highest order. It further states that local governments are to address the housing needs of all economic segments, while considering the economic, environmental and fiscal factors and community goals set forth in the General Plan.

**TABLE H-1
STATE HOUSING ELEMENT REQUIREMENTS**

Required Housing Element Component	Reference
A. <u>Housing Needs Assessment</u> 1. Analysis of population trends in Tustin in relation to regional trends 2. Analysis of employment trends in Tustin in relation to regional trends 3. Projection and quantification of Tustin's existing and projected housing needs for all income groups 4. Analysis and documentation of Tustin's housing characteristics including the following: a. level of housing cost compared to ability to pay; b. overcrowding; c. housing stock condition. 5. An inventory of land suitable for residential development including vacant sites and having redevelopment potential and an analysis of the relationship of zoning, public facilities and services to these sites 6. Analysis of existing and potential governmental constraints upon the maintenance, improvement, or development of housing for all income levels 7. Analysis of existing and potential nongovernmental and market constraints upon maintenance, improvement, or development of housing for all income levels 8. Analysis of special housing need: handicapped, elderly, large families, female-headed households, farmworkers	HTM pg. 10-29 HTM pg. 14 HTM pg. 39-41 HTM pg. 21-22 HTM pg. 17 HTM pg. 32-24 HE pg. 20-22 HE pg. 17-20 HE pg. 15-17 HE pg. 10-15

TABLE H-1
STATE HOUSING ELEMENT REQUIREMENTS
 (continued)

Required Housing Element Component	Reference
9. Analysis concerning the needs of homeless individuals and families in Tustin	HE pg. 13-14
10. Analysis of opportunities for energy conservation with respect to residential development	HTM pg. 57-58
B. <u>Goals and Policies</u>	
1. Identification of Tustin's goals, quantified objectives and policies relative to maintenance, improvement, and development of housing	HE pg. 23-29
C. <u>Implementation Program</u>	
An implementation program should do the following:	
1. Identify adequate sites which will be made available through appropriate action with required public services and facilities for a variety of housing types for all income levels	HE pg. 51-69
2. Program to assist in the development of adequate housing to meet the needs of low-and moderate-income households	HE pg. 51-69
3. Identify and, when appropriate and possible, remove governmental constraints to the maintenance, improvement, and development of housing in Tustin	HE pg. 51-69
4. Conserve and improve the condition of the existing and affordable housing stock in Tustin	HE pg. 51-69
5. Promote housing opportunities for all persons	HE pg. 51-69
6. Identify programs to address the potential conversion of assisted housing developments to market rate units.	HE pg. 51-69

HTM - Housing Technical Memorandum
 HE - Housing Element

While a city must consider housing needs for all economic segments, it must also maintain internal consistency among other elements of the General Plan as required by state law. Neither the Housing Element nor any other element may supersede any other required element of the Tustin General Plan.

The Housing Element relates to other elements in a variety of ways. The Land Use Element directly relates to the Housing Element by designating areas of the City in which a variety of residential types and densities may exist.

The Housing Element's relationship to the Conservation, Open Space, and Recreation Element is conditioned by the need to serve a growing population's recreational needs in the areas of the City with the highest density. Also, housing needs for low cost land must be balanced by the need to conserve natural resources.

The Circulation Element attempts to provide an efficient and well balanced circulation system. This system must be designed to accommodate allowed land uses, including residential uses, and the intensity of allowable uses must not exceed the ultimate capacity of the circulation system to accommodate them.

The Safety Element relates to the Housing Element by designating areas which are unsafe for development such as Alquist-Priolo Zones, floodplains, et cetera.

Similar to the Safety Element, the Noise Element relates to the Housing Element by addressing a health related issue area. Techniques for reducing noise often involve buffers between land uses to reduce noise.

CITIZEN PARTICIPATION

Public participation played an important role in the formulation of Tustin's housing goals and policies, and in the development of a Land Use Plan which determines the extent and density of future residential development in the community. Public participation in the General Plan process occurred through the following methods which assisted the City decision makers:

- Identified issues and community concerns through a survey sent to 5,000 households in the City, of which over 1,600 responded;
- Held two "Open House" sessions to solicit input for identifying issues and formulating goals;
- Provided opportunities for the public, both prior to preparation and during review of the Preliminary Draft General Plan, to address decision makers directly regarding issues and concerns at Planning Commission and joint City Council/Planning Commission General Plan workshops; and
- Held public hearings before the Planning Commission and City Council to facilitate public review and comment on the Draft General Plan and supporting documents.

SUMMARY OF ISSUES, NEEDS, CONSTRAINTS AND OPPORTUNITIES

This section of the Housing Element summarizes the current and projected housing needs for Tustin. The Element also estimates the number of households that meet Federal or State criteria for special consideration when discussing specialized needs, and evaluates assisted units at risk of conversion. Additionally, certain constraints which may discourage the construction of new housing are described. These constraints may include a wide range of factors that may increase the cost of new residential development. Finally, opportunities for housing sites are examined.

SUMMARY OF HOUSING NEEDS

A number of factors will influence the degree of demand or "need" for housing in Tustin in coming years. The major "needs" categories considered in this Element include:

- Housing needs resulting from increased population growth, both in the City and the surrounding region;
- Housing needs resulting from household overcrowding;
- Housing needs resulting from the deterioration or demolition of existing units;
- Housing needs that result when households are paying more than they can afford for housing;
- Housing needs resulting from the presence of "special needs groups" such as the elderly, large families, female-headed households, households with a handicapped person, and the homeless; and
- Housing needs resulting from conversion of the assisted housing stock to market rate.

Population Growth

Between 1980 and 1991, the City's population grew from 36,119 to 52,145, an increase of 44.4 percent. The City's growth rate was faster than the countywide growth rate of about 27 percent, but was not as fast as some developing cities such as Irvine, which experienced nearly an 80 percent increase in growth during this period.

Approximately 20 percent of Tustin's population growth can be attributed to annexations that have occurred since 1980. The remainder can be attributed to a variety of other factors, including new residential construction in East Tustin a changeover in population from smaller to larger families, rebuilding of existing developed areas, and infill development.

Along with the City's population growth has been an increase in unit overcrowding, as households "double up" to save on housing costs. According to the 1990 Census, 4.2 percent of the owner-occupied units and 16.2 percent of the renter-occupied units in Tustin were overcrowded. This represents a substantial increase in overcrowding since 1980, when only 1.2 percent of owner-occupied and 5.3 percent of renter-occupied units were overcrowded.

Substandard Units

The majority of Tustin's housing stock is in good structural condition, a result of the relatively young age of the housing stock. It is generally accepted that housing units will be in need of major rehabilitation 30 years after construction.

The County 1984 Housing Assistance Plan (HAP) identified 314 units as substandard, with 242 being suitable for rehabilitation and 72 requiring demolition. Of the 242 that were found to be suitable for rehabilitation, 103 were owner-occupied homes and 139 were rental units.

In 1991, approximately seven percent (7%) of the City's housing stock was over 30 years old. However, in ten years, nearly half (48%) of the City's housing stock will be over 30 years old. This indicates a potential need for rehabilitation and continued maintenance of approximately 9,370 dwelling units by the year 2000.

Affordability

State and Federal standards for housing overpayment are based on an income-to-housing cost ratio of thirty percent and above. Households paying greater than this percentage will have less income left over for other necessities, such as food, clothing and health care. It is recognized, however, that upper income households are generally capable of paying a larger proportion of their income for housing, and therefore estimates of housing overpayment generally focus on lower income groups.

The Regional Housing Needs Assessment (RHNA) prepared by the Southern California Association of Governments (SCAG) identifies housing overpayment for the City's lower income households based on data from the 1980 census. (Lower income households are defined as households whose total gross income is less than 80 percent of the County median.) According to the RHNA, an estimated 42% (or 3,507) of Tustin's lower income households were paying more than 30 percent of their income on housing in 1988. Of these overpayers, 1,838 are classified as Very Low Income and 1,668 are Low Income.

The distinction between renter and owner housing overpayment is important because, while homeowners may over-extend themselves financially to afford the option of home purchase, the owner always maintains the option of selling the home, thereby generally lowering their housing costs. Renters, on the other hand, are limited to the rental market, and are generally required to pay the rent established in that market. According to the RHNA, of the total 3,507 lower income households identified as overpayers, 3,190 were renter households and only 316 were owner households. This discrepancy is largely reflective of the tendency of renter households to have lower incomes than owner households.

Special Needs Groups

Certain segments of the population may have a more difficult time finding decent, affordable housing due to special circumstances. These groups may require specific alteration to housing to meet their needs. Included as special needs groups are the elderly, handicapped, female-headed households, large families, homeless, and military personnel. There are no known "farmworkers" residing in Tustin and, therefore, this group is not discussed.

Elderly: The special needs of many elderly households result from lower fixed incomes, physical disabilities, and dependence needs. In 1980, 2,825 households or 19.7 percent of the total households in Tustin were made up of persons 60 years of age or older. By 1990, this number had increased to 3,748 or 20.4 percent of the population.

The majority (63%) of these elderly households in 1990 represented households with two or more persons residing in the unit. The specific make-up of these households follows various potential scenarios. They may be empty-nesters living in a single-family home with little or no mortgage payment. Although the home may be too large for their needs, selling the home and buying or renting a smaller unit may be too expensive to consider. Other households may have children who have moved back in due to the high cost of housing.

The second highest percentage of elderly households in 1990 (1,065 units) were one-person households. The needs of these people could be served by a small efficiency unit that permits an independent lifestyle. Two important factors that come into play when planning for this type of unit are security and access to services. Since many seniors do not drive, these units should either be located near support services or provide a transportation network that links seniors with services.

Escalating housing costs, particularly in the rental market, severely impact housing affordability for many elderly who are usually on fixed incomes. Since 1984, there have been two new senior housing developments constructed in the City. These projects are a 20-unit apartment project limited solely to seniors with limited income and an 85-unit congregate care facility with 15 restricted affordable units.

Handicapped: Physical handicaps can hinder access to housing units of traditional design as well as potentially limit the ability to earn adequate income. An estimated 1.1 percent of the population in Tustin has a transportation disability, defined as a physical condition which presents difficulty in the use of public transportation. Under this definition, approximately 558 persons in Tustin are considered "handicapped". Special housing needs of handicapped individuals include wheelchair accessibility, railings, and special construction for interior living spaces. The Housing Element sets forth policies to encourage the development of handicapped-accessible housing.

Large Families: A family household containing five or more persons, as defined by the Census, is considered a large family. Large families are identified as a group with special housing needs because of the limited availability of adequately sized, affordable housing units. Large families are often of lower income, frequently resulting in the overcrowding of smaller dwelling units and in turn accelerating unit deterioration.

In 1980, 8.3 percent of Tustin's total households had five or more persons residing in the unit. According to the 1990 Census, 2,026 family households, or 11 percent of all households, had five or more persons. This increase in large family households is likely associated with the increase in the City's Hispanic population.

The primary need of large families is to provide enough room for all members of the family to avoid overcrowding. In 1980, 14.5 percent of the City's housing units contained four or more bedrooms. Thirty-three percent of the owner-occupied housing units contained four or more bedrooms. Rental-occupied units accounted for 2 percent of units with four or more bedrooms.

In the East Tustin area, zoning standards permit mixed types of development, and the City has encouraged the provision of a variety of housing unit types and sizes. Accordingly, the number of housing units capable of accommodating large families is increasing since projects currently under construction or recently completed include three-bedroom apartments and four-bedroom single-family homes.

Female-Headed Households: Female-headed households tend to have low incomes and special needs, thus limiting housing availability for this group. One of the more dramatic changes in types of households since the 1970 Census has been the increase in this group. According to the 1970 Census, approximately 8 percent of the family households in Tustin had a female head. The 1980 Census showed an increase to 17.8 percent, or 1,578 households. However, by 1990, while the absolute number of female-headed households increased to 2,120, their proportion of the total population declined to 11.6 percent.

Of the 1,578 female-headed households in 1980, 1,100 had children 18 years of age or younger. For these families it is important that the home be close to schools and services.

Of the total number of female heads of household in 1980, 11.6 percent were below the poverty level. Assuming the same percentage holds in 1990, this represents 245 female-headed households below the poverty level. For these households, locating ideal housing is severely restricted. Due to financial constraints, the family is often not able to find housing that is close to needed services, schools, and public transportation.

Homeless: Throughout the country, homelessness has become an increasing problem. Factors contributing to the rise in homeless include the general lack of housing affordable to Low and Moderate income persons, increases in the number of persons whose incomes fall below the poverty level, reductions in public subsidy to the poor, and the de-institutionalization of the mentally ill.

A survey of all jurisdictions in the SCAG planning area has been used to identify the number of homeless persons in the region. While the survey results provide only an estimate of the homeless population, they may lend an order-of-magnitude sense of the problem. Additionally, the issue of homelessness is considered regional in nature. Nomadic tendencies of homeless persons make it difficult to assess the population accurately.

Of the 79 municipalities responding to the survey, a total of 45,154 homeless persons were reported. The majority of these persons (75%) were reported in the City of Los Angeles. The April 1988 Strategic Plan of the Orange County Homeless Issues Task Force estimates there were approximately 4,000 to 10,000 homeless persons in Orange County.

In February, 1990, the Research Committee of the Orange County Homeless Issues Task Force published a report ("Demographic Profile and Survey of Homeless Persons Seeking Services in Orange County") which provided a demographic profile of homeless persons seeking services in Orange County. While the report did not rely on a scientifically random sample of the homeless population, it did rely on interviews with 1,090 homeless persons through 19 services agencies in the County of Orange. The report showed the mean age of the homeless persons interviewed was 31. Two-thirds were men, one-third were women, and one-third of all men were veterans. One-quarter of all those interviewed had dependent children. Fifty-percent of all respondents indicated that their inability to afford housing was a major cause of their homelessness.

The 1990 census indicates that there are 32 homeless persons housed in emergency shelters in the City and another ten are visible in street locations. However, police reports and windshield surveys have shown that there are no established areas where homeless persons congregate in the City and that most persons migrate through Tustin, rather than stay for extended periods of time.

Within the City of Tustin there are a variety of non-profit services which provide direct housing and other services to homeless persons. These include two homeless shelters, a feeding program affiliated with the United Way, and a homeless teen program which provides housing for up to six persons.

The two shelters in Tustin, Christian Temporary Housing and the Sheepfold, both serve families with children. Christian Temporary Housing, a 62-bed shelter, provides shelter, supplemental food, and counselling referrals to homeless families. Christian Temporary Housing receives funds from the State, United Way, and private donors. Guests are limited to 60-day stays, must be eligible to receive AFDC (Aid for Families with Dependent Children) or State funds, and are required to save 80 percent of any income that they earn during their stay.

The 45-bed Sheepfold shelter provides shelter, food, clothing, job-training, and job-referral services to women with children. Guests are admitted on a first-come, first serve basis. Usually all beds are filled. In addition to serving the immediate Tustin area, the Sheepfold Shelter provides service to a large service area extending beyond Tustin's boundaries, including many portions of Orange and San Bernardino Counties.

Numerous other agencies provide shelter and other services to the homeless in the nearby cities of Santa Ana, Irvine, and Orange. The Orange County Homeless Issues Task Force, a non-profit homeless advocacy organization, maintains a list of these and other homeless services in Orange County.

Military Personnel: A portion of the Marine Corps Air Station (MCAS) is located within the City. On-base housing includes motel-type barracks for 2,500 single servicemen or married servicemen who are voluntarily separated from their families, as well as 1,539 family housing units for married serviceman and their families, housing a total of 6,000 service personnel and dependents. As of August 1992, 985 of these family housing

units were located within the City of Tustin, providing housing for approximately 3,523 persons.

Since Orange County in general has a relatively high cost of living, especially in regard to housing, adequate support for family housing needs at the Station has become increasingly difficult.

The MCAS facility in Tustin has been identified by the U.S. Department of Defense for closure in July 1997. As part of the closure process, the uses for this site will be re-evaluated as part of a specific plan process. It is estimated that 500,000 square feet of military barracks could be abandoned upon base closure. However, family housing at MCAS is expected to remain. Also, closure of MCAS will require assessment under the McKinney Act of possible homeless shelter opportunities.

Preservation of Low Income Units at Risk of Conversion

Subsequent to adoption of the City's 1989 Housing Element, State law took effect requiring jurisdictions to address the preservation of assisted housing in their housing elements. This update to the City's Housing Element fulfills these requirements to identify, analyze, and propose programs to preserve housing units that are currently restricted to low income housing use and that will become unrestricted and possibly be lost as low income housing.

Consistent with State requirements, the following are included within the Housing Element:

1. An inventory of restricted low income housing projects in the City and their potential for conversion;
2. An analysis of the costs of preserving and/or replacing the units "at-risk" and a comparison of these costs;
3. An analysis of the organizational and financial resources available for preserving and/or replacing the units "at risk" (see Review of Past Performance under Housing Element Implementation Program);
4. Quantified objectives for the number of "at-risk" units to be preserved (see Quantified Objectives discussion under Housing Element Implementation Program); and

5. Programs for preserving the "at-risk" units (see Program discussion under Housing Element Implementation Program).

Inventory of At-Risk Units: This Housing Element addresses all of the low income housing units in the City of Tustin that are at risk of converting to non-low income housing uses between July 1, 1989 and July 1, 1999. Analysis in this section is divided into five-year intervals to coincide with the planning period of this and subsequent housing elements.

Table H-2 is an inventory of all multi-family rental units assisted under federal, state, and/or local programs, including HUD programs, state and local bond programs, redevelopment programs, and local in-lieu fee, inclusionary, density bonus, or direct assistance programs. The inventory includes all units that are eligible to change to non-lower income housing uses due to termination of subsidy contract, mortgage prepayment, or expiring use restrictions.

**TABLE H-2
ASSISTED HOUSING INVENTORY**

Project Name, Address (incl. zip)	Owner: Name, Address, Tel. #	Type(s) of Gov't Assistance	Type/Length of Affordability Controls (including Sec. 8)	Earliest Potential Conver- sion Date(s)	# of Units	Tenant Type (i.e., Elderly, Family)	Bedroom Mix	Date Built (if known)	Condition (if known)
FEDERAL									
Orange Gardens 1602 Nisson Road Tustin, CA 92680 832-8400	Orange Gardens LDP 12884 Bradley Ave Sylmar, CA 91342	HUD 236(J)(1) Section 8	40-yr. loan 20-yr. prepayment option	5/12/94 6/25/94	160 16	Family/ Senior	16 1-br 104 2-br 40 3-br	1973	Good
Tustin Gardens 275 E. 6th Tustin, CA 92680 213-204-2050	Goldrich & Kest 5150 Overland Ave. Culver City, CA 90230	HUD 221(D)(4) Section 8	---	--- 9/16/95	101 100	Elderly	101 1-br	1979	Good
STATE									
Rancho Alisal 13800 Parkcenter Tustin, CA 92680	The Irvine Co. 550 Irvine Ctr. Dr. P.O. Box 1 Newport Beach, CA 92660-9959	Bond Financed Issue V of 1985 Regulatory Agreement and Declaration of Restrictant Covenants	Income restricted. No rent restrictions	11/1/2001	69	Family	8 1-br 49 2-br 12 3-br	1987	Good
Rancho Maderas 13408 Heritage Way Tustin, CA 92680 730-3700	The Irvine Co. 550 Irvine Ctr. Dr. P.O. Box 1 Newport Beach, CA 92660-9959	Bond Financed Issue V of 1985 Regulatory Agreement and Declaration of Restrict Covenants	Income restricted. No rent restrictions	11/1/2001	54	Family	10 1-br 44 2-br	1988	Good
Rancho Tierra 13202 Myford Rd. Tustin, CA 92680 730-5868	The Irvine Co. 550 Irvine Ctr. Dr. P.O. Box 1 Newport Beach, CA 92660-9959	Bond Financed Issue V of 1985 Regulatory Agreement and Declaration of Restrictant Covenants	Income restricted. No rent restrictions	11/1/2001	51	Family	7 3-br 44 2-br	1988	Good

Source: Compiled by Cotton/Beland/Associates, 1992.

The inventory was compiled by interviews with City staff, the County Housing Authority, and HUD, and review of "Inventory of Federally Subsidized Low-Income Rental Units at Risk of Conversion" (California Housing Partnership Corporation), and "The Use of Housing Revenue Bond Proceeds - 1990", (California Debt Advisory Commission).

Description of Units and Conversion Potential: Tustin has two projects that contain units at risk of converting to non-low-income use between July 1, 1989 and July 1, 1999. Orange Gardens, a 160-unit Section 236 (J)(1) project, is eligible for prepayment in May, 1994. Prepayment of Orange Gardens Section 236 loan is regulated by the Low-Income Housing Preservation and Resident Homeownership Act of 1990 (LIHPRHA). Tustin Gardens is a 101-unit Section 221(D)(4) project with a Section 8 contract for 100 units due to expire in September, 1995.

Various restrictions and incentives affect the likelihood that at risk units will convert to other uses. LIHPRHA establishes provisions that allow owners of federally subsidized projects that are eligible for prepayment a fair rate of return on the equity in their projects in exchange for continued affordability. If the owner of such a project wishes to prepay the loan, he/she may file a Notice of Intent to prepay up to two years in advance of the prepayment date. The filing of the Notice of Intent begins a series of steps designed to maximize the likelihood that the units will be maintained as affordable. Owners of the project may continue to maintain the project as low-income housing in exchange for additional federal incentives. The project may also be offered for sale to qualified nonprofit entities, tenants and public bodies and if one of those organizations offers to purchase the building at its appraised value, the owner must sell it to that organization. Prepayment and conversion of the housing to non-low-income use will only occur if there is no willing buyer to purchase the project.

The two year notification period set out under LIHPRHA has not yet commenced on the Orange Gardens Project.

A representative of the firm that manages Orange Gardens was contacted for this analysis. He indicated that the owner might be interested in prepaying the Section 236 HUD loan on the property when the loan becomes eligible for prepayment in 1994. The representative indicated that market rents in the area are

substantially higher than those that can currently be charged under the current loan based restrictions.

Orange Gardens maintains a Section 8 contract for 16 units in the project. Under the HUD Section 8 Program, HUD pays owners of buildings with Section 8 units the difference between what the Section 8 tenants can pay (estimated at 30 percent of household income) and what HUD estimates to be Fair Market Rent on the unit. It is anticipated that the existing contract will be given the option to renew when it expires. This contract is due to expire on June 20, 1994.

The primary reason that an owner would chose to prepay a HUD loan would be that he or she could receive higher rents than those currently receivable under the rent restriction provisions of the loan. Because the management representative reported market rents to be considerably higher than current rents and also reported that the owner may prepay, the building has a high potential to convert to market rate housing.

There are 100 low income housing units in Tustin Gardens at risk of conversion during the period between July 1, 1994 and July 1, 1999. Tustin Gardens is a 100-unit project for elderly tenants. This project is financed under the HUD Section 221 (D)(4) program with a Section 8 contract. Projects financed under the Section 221(D)(4) market rate program alone have no binding income use restrictions. Affordability for Tustin Gardens is, however, controlled by the Section 8 contract. This Section 8 contract will expire on September 16, 1995 with five-year renewal options. However, the owners of Tustin Gardens can choose to opt out of Section 8 program as long as a Notice of Intent is filed one year prior to contract expiration.

State law does not require a description or analysis of units that will not be at risk of conversion until after the planning period that ends on July 1, 1999. However, in order to facilitate the long range planning for these units, they are briefly described below, and are included in Table H-4.

There are three housing projects in Tustin that have tenant income restrictions scheduled to expire in the year 2001. Rancho Alisal, Rancho Maderas and Rancho Tierra all contain units which can only be rented by tenants below specified incomes.

Cost Analysis: This section analyzes and compares the costs of acquiring the "at risk" Orange Gardens and Tustin Gardens by non-profit housing organizations versus the cost of building replacement units, should the projects convert and be lost as low-income housing. The cost estimates used in this analysis were derived from conversations with local agencies, economic consultants, and non-profit housing developers.

Acquisition and Preservation Cost: The market value of the projects can be determined by potential project income adjusted for market rent, vacancy, operating expenses, and building condition. Market value for Orange Gardens is approximately \$9.8 million and \$5.4 million for Tustin Gardens, yielding a total valuation of \$15.2 million for the two projects. The buildings are reported to be in good condition and thus, no major rehabilitation is anticipated.

Under LIHPRHA, HUD will provide mortgage loan insurance on acquisition loans for up to 95 percent of Preservation Equity to priority purchasers. While HUD also provides financing for rehabilitation and closing costs, there may be costs that HUD does not cover, such as an adequate level of rehabilitation or buyer overhead costs. An additional five percent in acquisition costs have been added to the minimum local subsidy to cover such costs, for an estimated local subsidy contribution equal to 10 percent of Preservation Equity.

Preservation Equity is calculated by subtracting the balance of the existing HUD loan from the estimated fair market value for the project. However, information on outstanding HUD debt was not available for preparation of this document; therefore, estimated market value was used to establish an upper limit on the preservation cost for Orange Gardens. Actual preservation cost will be prepared by HUD when the owner initiates the prepayment process. Assuming the availability of a 95 percent equity loan for Orange Gardens, \$490,000 would be required as a five percent downpayment and another five percent (\$490,000) to cover such costs rehabilitation and buyer overhead. Acquisition of Tustin Gardens will not be regulated by LIHPRHA. A ten percent downpayment of \$540,000 may be required for Tustin Gardens.

Subject to appropriations, HUD will provide Section 8 contracts on acquired "at-risk" units. It is assumed that rental income and HUD Section 8 subsidies will defray monthly mortgages and maintenance costs.

Replacement Cost: If Orange Gardens and Tustin Gardens were to convert, a total of 260 units of assisted housing could be lost (116 one-bedroom units, 104 two-bedroom units, and 40 three-bedroom units). Discussions with non-profit housing developers in Orange County area indicate that the per unit cost of constructing new units, including land, averages roughly \$75,000 for a one-bedroom unit, \$85,000 for a two-bedroom unit, and \$90,000 for a three-bedroom unit. Applying these estimates to the number of units and bedroom mix for Orange Gardens and Tustin Gardens, an estimated total replacement cost of \$21.2 million would be required to replace all at-risk units in both projects. Further discussions with the Tustin Redevelopment Agency's consultant, David Rosen, has indicated that these replacement costs could be even higher (see Appendix A).

Cost Comparison: Should both Orange Gardens and Tustin Gardens convert to market rate housing, the cost of acquiring and preserving the projects with a total valuation of \$15.2 million is much less than replacing the units with new construction at an estimated value of \$21.2 million. If the "Affordable Gap" were subsidized, the required commitment of resources for preserving units "at risk" could conceivably be much lower.

Programs for Preservation of At-Risk Units: The City plans to monitor at risk housing units to ensure that those units will not be lost as low income housing. The City will subsidize units and/or work with nonprofits in the community to explore possible new construction of replacement housing by nonprofits or nonprofit acquisition of existing buildings with at risk units. Specific actions that the City will take to protect (or replace) at risk units are identified in the Housing Element Implementation Program.

Summary of Issues

Housing is a fundamental component of land use within a community necessary to support the resident population. Issues associated with housing in Tustin include the following:

- Approximately 42 percent of the City's lower income households (households which earn less than 80 percent of the County median) are currently overpaying for housing.

- California State law requires the Southern California Association of Governments (SCAG) to allocate housing needs to local governments. For the 1989-1994 planning period, SCAG's Regional Housing Needs Assessment identifies a housing growth need of 2,085 dwelling units in Tustin. SCAG further allocates this need among the following income categories: 724 higher-income units, 484 moderate income units, 488 low-income units and 390 very low income units.
- The average household size in the City increased from 2.43 in 1980 to 2.69 in 1991. This is largely due to increases in the City's Hispanic population. Between 1980 and 1991, that population increased from about 8 percent of the population in 1980 to about 20 percent in 1991. Hispanic families tend to have larger households, thus indicating a potential need for larger housing units to accommodate these families.
- Household overcrowding has increased significantly in Tustin over the past decade as individuals and families "double up" to save on housing costs.
- Based upon available information on rental rates in the City, it is extremely difficult to find rental housing that is large enough and affordable to large, low-income families.
- As the City's population ages, the number of elderly persons will increase. This underscores an increasing need to address the special housing needs of the elderly.
- Handicapped individuals in Tustin have particular housing needs relating to access and adaptability.
- Female-headed households make up an increasing percentage of the City's population. Many of these households have incomes below the poverty level and have special housing needs such as access to childcare services.
- Growing numbers of homeless persons in Southern California have created particular housing and social service needs.
- The presence of MCAS Tustin and nearby MCAS El Toro has an impact on the demand for affordable housing in Tustin.
- High housing costs have put home ownership beyond the reach of many potential first-time homebuyers in the City.

- Obtaining affordable housing has become a problem for persons of all income groups in California.
- Governmental regulations, such as land use controls, fees, and processing procedures, can act as constraints to the maintenance and production of housing in the City.
- By State law, the City must identify and develop programs and policies to address affordable housing units in the City that are at risk of converting to market rate housing. During the 1989-1999 planning period, the City of Tustin faces the potential conversion of 260 low-income units.
- The City has an unusually high proportion of renter-occupied housing. In 1980, 59.6 percent of the City's households were renter-occupied, compared to 37.6 percent renter-occupied units countywide. The 1990 Census indicates the proportion of renter-occupied households has remained constant in Tustin. Promotion of home ownership opportunities in the City may be necessary to maintain a balanced, stable community.
- Even though the City's housing stock is relatively young and in good condition, by the year 2000, over 45 percent of the City's housing stock will be over 30 years old--the age at which housing typically begins to require major repairs. Maintenance and improvement of existing housing conditions over the long term will require ongoing maintenance of existing units, rehabilitation or replacement of substandard housing and programs to maintain neighborhood quality.
- Older neighborhoods in Tustin contain a considerable number of historic, turn-of-the-century residences which should be preserved as part of the community's heritage.
- The lack of adequately size, affordable housing in the City can lead to overcrowding and, in turn, deteriorated housing conditions.
- A large portion of the City's lower income housing is concentrated in the southwest neighborhood. Targeted programs may be necessary to enhance this area.
- Due to its sunny climate, the City is in an excellent position to take advantage of solar energy in order to reduce reliance on non-renewable energy supplies.

HOUSING CONSTRAINTS

Actual or potential constraints on the provision and cost of housing affect the development of new housing and the maintenance of existing units for all income levels. Market, governmental, infrastructural, and environmental constraints to housing development in Tustin are summarized below and discussed in greater detail in the Housing Element Technical Memorandum.

Market Constraints

The high cost of renting or buying adequate housing is the primary ongoing constraint of providing adequate housing in the City of Tustin. High construction costs, land costs and market financing constraints are all contributing to increases in the availability of affordable housing.

Construction Costs: The single largest cost associated with building a new house is the cost of building materials, usually comprising between 40 to 50 percent of the sales price of a home. These costs are influenced by many factors such as the cost of labor, building materials, and site preparation. The International Conference of Building Officials (ICBO) estimates that the cost of residential wood frame construction averages \$50.70 per square foot and reaches as high as \$71.80 per square foot. Therefore, the costs attributed to construction alone for a typical 2,200 square foot, wood frame home would be \$111,540.

A reduction in amenities and quality of building materials (above a minimum acceptability for health, safety, and adequate performance) could result in lower sales prices. Additionally, pre-fabricated, factory built housing may provide for lower priced housing by reducing construction and labor costs. An additional factor related to construction costs is the number of units built at the same time. As the number of units developed increases, construction costs over the entire development are generally reduced based on economies of scale. This reduction in costs is of particular benefit when density bonuses are utilized for the provision of affordable housing.

Land: Land costs include the cost of raw land, site improvements, and all costs associated with obtaining government approvals. Based upon recent cost information about new development projects in East Tustin, land costs are

approximately \$18 per gross square foot for single-family zoned property and \$28 per square foot for land zoned for high density (i.e., R-3) development (Source: The Irvine Company). Most of the sites in Old Town identified for future residential or mixed use potential are presently zoned for commercial uses. Commercial land sales in this vicinity include land sale prices in the high \$20s to mid \$30s per square foot.

Limited land is available within the unincorporated North Tustin area. As a result, housing prices range from \$350,000 to more than \$1,000,000 for homes with a panoramic view.

The unavailability of land within the developed areas of the City and the price of land on the fringes are constraints adding to the cost of housing and pricing housing out of the reach of low- and moderate-income families.

Financing: Interest rates can have an impact on housing costs which can be felt by owners, renters, purchasers and developers. Some mortgage financing is variable rate, which offers an initial lower interest rate than fixed financing. The ability of lending institutions to raise rates to adjust for inflation will cause many existing households to overextend themselves financially, as well as a return to a situation where high financing costs substantially constrain the housing market. An additional obstacle for the first-time home buyer can still be the minimum downpayment required by lending institutions.

Even if Tustin homebuyers are able to provide a 10 percent downpayment and obtain a 10 percent 30-year loan, monthly mortgage payments on median priced single-family detached homes in the City place such homes out of the reach of moderate and lower-income households in the City (see Housing Element Technical Memorandum Table HTM-13). At a 10 percent interest rate, monthly mortgage payments on median priced condominiums and townhouses place such units out of reach of Tustin's low and very low income households (see Housing Element Technical Memorandum Table HTM-6).

Under the Home Mortgage Disclosure Act (HMDA) lending institutions are required to report lending activity by census tract. Analysis of available HMDA reports does not indicate documented cases of underserved lower income census tracts in Tustin (refer to Technical Memorandum, page 55).

The City offers a variety of low interest rehabilitation loans through its CDBG program.

Profit, Marketing and Overhead: Developer profits generally comprise 10 to 15 percent of the selling price of single-family homes and slightly lower for condominiums. However, in communities like Tustin where the market demand for housing is high in comparison to the available housing supply, developers are able to command higher prices and may realize greater margins of profit, although the current economic recession has at least temporarily dampened these profit margins. Marketing and overhead costs also add to the price of homes.

Redevelopment Affordability Gap Analysis: In addition to information related to Housing Constraints provided in the City's Housing Element Technical Memorandum, David Rosen and Associates have prepared a Background Report for the City's Comprehensive Affordable Housing Strategy (completed in August of 1992). As part of the report, a detailed affordability gap analysis has been completed to illustrate the "gap" between the cost of developing housing for rent and ownership in Tustin and what households at a variety of income levels can afford to pay toward their housing expense. A Summary of Renter and Owner Affordability Gaps for certain prototypical unit types and incomes are provided as Appendix A of the Housing Element.

Governmental Constraints

Housing affordability is affected by factors in both the private and public sectors. Actions by the City can have an impact on the price and availability of housing in the City. Land use controls, site improvements requirements, building codes, fees and other local programs intended to improve the overall quality of housing may serve as a constraint to housing development.

Land Use Controls: Government agencies may place administrative constraints on growth through the adoption and implementation of land use plans and ordinances. The General Plan may restrict growth if only limited areas are set aside for residential land uses, and if higher residential densities are not accommodated. The zoning ordinance may impose further restrictions if development standards are too rigid, or if zoning designations do not conform to existing land uses.

Tustin's existing zoning ordinance allows for a range of residential densities from a maximum effective density of 4.36 units per net acre in the E-4 Residential Estate District to 24.9 units per net acre in the R-3 Multiple Family Residential District and 10 units per net acre in the MHP Mobilehome Park District.

Parking requirements in Tustin are generally two spaces per unit, with an additional requirement of one guest space per every four units in multi-family development.

Tustin has the highest percentage of multi-family units of any Orange County city. Based on the 1980 Census, only 26.3 percent of the housing stock in Tustin is devoted to single-family detached units and 71.4 percent to attached and multi-family units.

Current land use controls restrict development in single-family residential zones to one dwelling unit on parcels 10,000 square feet in the E-4 zone and parcels with a minimum of 7,200 square feet in the R-1 zone. However, the Planned Community District has authorized residential subdivisions with single-family lots of 5,000 square feet which significantly increases density potential.

The East Tustin Specific Plan provides for single-family detached products to be developed at a variety of densities. The Estate density description requires a minimum of lot-area of 8,000 square feet, not to exceed 2 units per acre. The Low Density designation requires a minimum lot area of 5,000 square feet while the Medium-Low designation requires a minimum lot area of 3,000 square feet and densities not to exceed 5 and 10 units per acre respectively.

Within the Multi-Family Residential District (R-3), a 35' height limitation and 65% coverage precludes the development of high-rise housing projects. In the interest of protecting adjoining single-family lot owners, multifamily structures above 20 feet in height require a conditional use permit when the structures are within 150 feet of single-family residentially zoned lots. While these height limits may place some restrictions on housing development, these limits are designed to maintain compatibility of land use intensity and to ensure proper and effective transportation within the community and are commonly used by local governments as a development tool to further this ideal.

Residential uses are permitted in the City's Old Town Commercial District which support primary commercial uses. Maximum residential densities permitted will be determined by the Planning Commission or City Council.

Limited residential uses are also permitted in areas designated Public/Institutional provided the intended occupants are related to the primary institutional uses.

Fees and Improvements: Various fees and assessments are charged by the City and other outside agencies (e.g., school districts) to cover costs of processing permits and providing services and facilities, such as utilities, schools and infrastructure. Almost all of these fees are assessed based on the concept of cost recovery through a pro rata share system, based on the magnitude of the project's impact or the extent of the benefit which will be derived.

Tustin is highly urbanized with most of its necessary infrastructure, such as streets, sewer and water facilities already in place. Nonetheless, site improvements can significantly add to the cost of producing housing. Cost-effective site planning or use of housing set-aside funds for those projects within the redevelopment project areas can minimize site improvement costs. The Housing Element Technical Memorandum (Table HTM-22) describes in detail required site improvements and provides a list of fees associated with development in the City.

Building Codes and Enforcement: The City of Tustin adopts all Uniform Building Codes (UBC), as required by State law, which establish minimum construction standards as applied to all residential buildings. The City's building codes are considered to be the minimum necessary to protect the public health, safety and welfare. Only local modifications to the codes are made which respond to local climatic or geographic conditions and which clarify Administrative procedures.

Although not mandated to do so, the City has also adopted the State Historical Code which relaxes building code requirements in the City's Cultural Resources Overlay District. This will reduce rehabilitation costs.

Local Processing and Permit Procedures: The evaluation and review process required by City procedures contributes to the cost of housing in that holding costs incurred by developers are ultimately manifested in the unit's selling price.

State law establishes maximum time limits for project approvals and City policies provide for the minimum processing time necessary to comply with legal requirements and review procedures.

The Community Development Department serves as the coordinating agency to process development applications for the approval of other in-house departments such as Fire, Police, Public Works/Engineering, and Community Services. All projects are processed through plan review in the order of submission. The City has eliminated the potential increase in financing costs caused by a delay in permit processing by assigning priority to the plan review and permit issuance for low-income housing projects. If a complete application is submitted, plans are simultaneously reviewed by all Design Review Committee members and plan checking departments. This process provides for a "one-stop" processing system which is required by State law. Additionally, for projects of significant benefit to the low-income community, such costs can be waived by the City Council or the use of redevelopment set-aside funds can further reduce or eliminate these costs to the developer of low-income projects.

Workload: Another governmental constraint is the number of staff and amount of staff time available for processing development projects. Since the workload is determined by outside and uncontrolled forces (economy and market for housing and availability of general fund revenue), a shortage of staff time may occur which could lead to increased processing time for development projects.

HOUSING OPPORTUNITIES

Future residential development in the City of Tustin will take place primarily in Tustin Ranch, a 1,750-acre specific plan area. The East Tustin Specific Plan would accommodate up to 9,178 dwelling units comprising more than one-third of the City's total residential land inventory. Smaller recycling and infill housing projects throughout the City will also contribute to the City's future housing stock. An important new housing opportunity will be provided in Old Town Tustin where residential uses will be permitted subject to City Council approval on a site by site basis. In any planning for future use of the Marine Corps Air Station, housing opportunities will be explored.

Table H-3 shows the existing and potential dwelling units under each General Plan land use category, as well as the potential net increase within each category. Based on the City's Land Use Plan, Tustin has a residential holding capacity of approximately 27,248 dwelling units, providing for a potential increase of 7,370 units over the April, 1992 total of 19,878 units. The Land Use Plan provides for a mix of unit types and densities, including low density single-family homes, medium density townhomes, higher density apartments, and mixed-use projects which allow for combined office and residential uses.

Approximately 90 percent of the 7,370 potential new units in Tustin will be built under the Planned Community Residential categories on vacant land in the East Tustin area. Eight percent of the units will be provided through recycling of existing lower density uses and another two percent will be built as infill units throughout the City.

**TABLE H-3
RESIDENTIAL DEVELOPMENT POTENTIAL UNDER
LAND USE PLAN**

Land Use Category	(1) Existing DUs	Gross Acres Vacant	Potential DUs/ Vacant	Gross Acres Under- Utilized	(2) Potential DUs/ Under- Utilized	Potential DUs/ Vacant & Under- Utilized	Maximum General Plan Buildout
Low Density Residential (1-7 du/ac)	2,844	18.5	85	0	0	85	2,929
Medium Density Residential (8-15 du/ac)	768	1.0	10	40.5	300	310	1,078
High Density ⁽³⁾ Residential (15-25 du/ac)	10,345	3.2	55	27.7	256	311	10,655
Mobile Home Park (1-10 du/ac)	428	0	0	0	0	0	428
Military (8-15 du/ac)	1,539	—	—	—	—	—	1,539
PC Low Density Residential	2,236	486.0	1,442	0	0	1,180	3,416
PC Medium Density Residential	100	331.3	2,747	0	0	3,509	3,609
PC High Density Residential	1,618	102.5	1,754	0	0	1,975	3,593
TOTAL	19,878	942.5	6,814	68.2	556	7,370	27,248

Source: Tustin General Plan Land Use Element - Existing Land Use Map and Land Use Policy Map, October, 1992.

- (1) Number of existing housing units in the City of Tustin as of April, 1992. This number exceeds the 1990 Census estimates. DUs = dwelling units.
- (2) Potential dwelling units on under-utilized parcels represent net increases over existing units on site.
- (3) 291 dwelling units within the High Density Residential category are assumed for the Old Town Commercial area.

According to the Regional Housing Needs Assessment (RHNA), the City of Tustin has a housing need of 2,085 units during the five-year period between July, 1989 and July, 1994, to be distributed among the following income groups illustrated in Table H-4.

**TABLE H-4
TUSTIN FUTURE HOUSING UNIT NEEDS
BY INCOME GROUP
1989 - 1994**

Income Level	Units
Very Low Income	390
Low Income	488
Moderate Income	484
Upper Income	724
TOTAL	2,085

Source: SCAG Regional Housing Needs Assessment, 1988.

According to the State Department of Housing and Community Development, housing built at densities of 18 units or more per acre is generally considered in non-coastal areas, such as Tustin, to be affordable to low income households, with housing built at densities of 25 units or more per acre generally considered to be affordable to very low income households.

While the City's Land Use Plan provides more than adequate land capacity to fulfill these needs, current development costs in Tustin may preclude the private housing market from providing affordability for low and very low income households without subsidies. The City and Redevelopment Agency will further assist in the development of affordable housing through programs set forth in the Housing Element, including the East Tustin Affordable Housing Program, density bonus, rental assistance, and effective utilization of its 20 percent set-aside fund.

HOUSING ELEMENT GOALS AND POLICIES

This section of the Housing Element contains the goals and policies the City intends to implement to address a number of important housing-related issues. The following five major issue areas are addressed by the goals and policies of the Housing Element: 1) ensure that a broad range of housing types are provided to meet the needs of both existing and future residents; 2) provide equal housing opportunities for all City residents; 3) ensure a reasonable balance between rental and owner occupied housing; 4) preserve existing housing and neighborhoods; and 5) ensure housing is sensitive to the existing natural and built environment.

HOUSING SUPPLY/HOUSING OPPORTUNITIES

Tustin is and will continue to be home to persons requiring a variety of housing options. At different stages in their lives, people require different housing arrangements. Additionally, the City must respond to the housing needs of all economic segments of community and ensure that housing discrimination does not serve as a barrier to housing in Tustin. It is also important that the City maintain a balance of housing types and that the City's housing stock is not overly skewed towards the provision of one type of housing. Finally, the continuing need for low income housing in the region requires the City attempt to preserve low income housing units that are at risk of converting to other uses.

GOAL 1: Provide an adequate supply of housing to meet the City's need for a variety of housing types to meet the diverse socio-economic needs of all community residents.

Policy 1.1: Promote the construction of additional dwelling units to accommodate Tustin's share of regional housing needs identified by the Southern California Association of Governments (SCAG), in accordance with adopted land use policies.

Policy 1.2: Provide for new affordable housing opportunities through acquisition and rehabilitation.

Policy 1.3: Preserve affordable housing units in the City, wherever possible, through actions such as the maintenance of a mobile home park zone, restrictions on R-3 zone uses, facilitating resident access to funding sources for low income housing, and preservation of assisted housing.

Policy 1.4: Promote the dispersion and integration of housing for low- and very-low income families throughout the community as opposed to within any particular geographic area or neighborhood.

Policy 1.5: Encourage the County of Orange to exercise its responsibilities for housing accommodations for low- and very-low income families within its jurisdiction in Tustin's sphere of influence.

Policy 1.6: Utilize the acquisition authority of the Redevelopment Agency, where feasible, to assist in creating opportunities which will expand opportunities to permit development of housing in the community.

Policy 1.7: Allow second (attached/detached) units in single- and multi-family districts subject to land use policy and any criteria of the zoning ordinance.

Policy 1.8: Achieve a housing market that recognizes housing as shelter and not merely as speculative investment so as to deter rapid turnover and deterioration which results from speculation.

Policy 1.9: Utilize Planned Community Districts and Specific Plans to authorize and promote a variety of lot sizes and housing types within subdivisions.

Policy 1.10: Promote cluster housing within the land use density standards of the General Plan for the purpose of reducing the cost of housing construction.

Policy 1.11: Encourage the availability of affordable housing for large, low-income families.

Policy 1.12: Encourage incentives to assist in the development of affordable housing such as 1) reducing permit processing time and waiving or reducing applicable permit fees; 2) on-site density bonuses when appropriate; 3) tax-exempt financing; 4) flexibility in zoning or development standards.

Policy 1.13: Use tax increment housing set-aside funds of the South Central and Town Center Redevelopment Areas to assist in encouraging housing opportunities within the jurisdiction of the City.

Policy 1.14: Encourage the design and occupancy of housing for senior citizens and the disabled. Promote the construction or rehabilitation and adaption of dwelling units accessible to seniors or the disabled.

Policy 1.15: Promote, assist, and facilitate the development of emergency and transient shelters through continued support of the County Homeless Assistance Program.

Policy 1.16: Encourage the provision of grants, donations, and technical assistance to various organizations and agencies who provide assistance to persons with special needs such as the homeless, handicapped, low-income, and elderly persons.

Policy 1.17: Participate in federal and state housing assistance and rehabilitation programs aimed at assisting households in need.

Policy 1.18: Utilize design and siting criteria in evaluating projects to ensure compatibility with surrounding developments, while taking into consideration ways to minimize housing costs.

Policy 1.19: Develop incentives to encourage non-profit and other for-profit private sector interests to use available federal and state programs for new or rehabilitated affordable housing.

Policy 1.20: Support state-enabling legislation for employers to contribute to the cost of housing for their employees.

GOAL 2: Ensure equal housing opportunities for all existing and future City residents regardless of race, religion, ethnicity, sex, age, marital status or household composition.

Policy 2.1: Promote equal opportunity housing programs within the community.

Policy 2.2: Provide active support and participation with the Orange County Fair Housing Board to provide fair housing opportunities.

Policy 2.3: Support the South County Senior Services Homesharing Program to match elderly and low and moderate income individuals who want to share housing costs in a joint living arrangement.

Policy 2.4: Support public and private efforts to eliminate all forms of illegal discrimination in housing.

Policy 2.5: Reduce the isolation of income and ethnic/racial grouping in the City through promotion of citizen interaction and encourage provision of expanded economic opportunities.

Policy 2.6: Minimize displacement of lower income and special needs households, whenever possible and, where necessary, to ensure that displacement is carried out in an equitable manner.

GOAL 3: Increase the percentage of ownership housing to ensure a reasonable balance of rental and owner-occupied housing within the City.

Policy 3.1: Encourage new housing construction for homeownership in a mixture of price ranges.

Policy 3.2: The Redevelopment Agency shall explore provision of favorable home purchasing options to low- and moderate-income households, such as interest rate write-downs, downpayment assistance, mortgage credits, and mortgage revenue bond financing.

Policy 3.3: Encourage alternative forms of homeownership, such as shared equity ownership and limited equity cooperatives.

GOAL 4: Preserve the existing supply of affordable housing in the City.

Policy 4.1: Continue to use Federal and State housing subsidies available for low-income families.

Policy 4.2: Identify on an ongoing basis all federal, state and local funds available to preserve and/or replace lower income units at risk of converting to non lower income housing, including redevelopment tax increment funds.

Policy 4.3: Assist non-profit organizations in securing the resources necessary to preserve and/or replace lower income units at risk of converting to non lower income housing.

Policy 4.4: Consider incentives to non-profit housing and for-profit private sector interests to purchase and/or maintain lower income units at risk of converting to non lower income housing.

MAINTENANCE AND CONSERVATION

Maintenance and preservation of a City's housing stock serves many ends. It prevents unhealthy living conditions and also eliminates the need for more costly housing rehabilitation later on. Housing preservation and maintenance also helps prevent neighborhood deterioration and encourage community pride. The City enforces codes and provides incentives to promote maintenance and conservation.

GOAL 5: Conserve maintain, rehabilitate and/or replace existing housing in neighborhoods which are safe, healthful and attractive, in accordance with adopted Land Use Policy. Improve the residential character of the City with an emphasis on revitalizing neighborhoods showing signs of deterioration. Promote conservation of the City's sound housing stock, rehabilitation of deteriorated units where they may exist City-wide, and elimination of dilapidated units which endanger the health, safety and well-being of occupants.

Policy 5.1: Through available financial incentives, encourage owners of rental housing units which are determined to be substandard, in need of repair and a hazard to the health and safety of the occupants to remove and replace or rehabilitate the structures.

Policy 5.2: Advertise and promote the availability of funds for the rehabilitation of single-family dwellings, mobile homes and apartments.

Policy 5.3: Periodically evaluate housing conditions in the City and, when appropriate, seek an increase in State and federal rehabilitation funds to address any increase in deteriorated housing conditions.

Policy 5.4: Continue to enforce health, safety, and zoning codes to eliminate conditions which are detrimental to the health, safety and general welfare of residents.

Policy 5.5: Preserve historic and architecturally-significant residential properties.

ENVIRONMENTAL SENSITIVITY

Housing design and land use patterns can have substantial impacts on the natural as well as the built environment. City policies and programs seek to minimize negative environmental impacts.

GOAL 6: Ensure that new housing is sensitive to the existing natural and built environment.

Policy 6.1: Attempt to locate new housing facilities in proximity to services and employment centers thereby enabling walking or bicycling to places of employment.

Policy 6.2: Promote energy conservation measures in the design of new housing units and the redevelopment of older housing units.

Policy 6.3: Require design review of lot placement in subdivisions to maximize passive solar energy and solar access.

RELATED GOALS AND POLICIES

The goals and policies described in the Housing Element are related to and support subjects included within other General Plan elements. In turn, many goals and policies from the other elements directly or indirectly support the goals and policies of the Housing Element. These supporting goals and policies are identified in Table H-5.

**TABLE H-5
HOUSING RELATED
GOALS AND POLICIES BY ELEMENT**

Housing Issue Area	RELATED GOALS AND POLICIES BY ELEMENT						
	Land Use	Housing	Circulation	Conservation\ Open Space	Public Safety	Noise	Growth Management
Housing Opportunities	1.8, 10.2						
Maintenance and Preservation	1.1, 4.6, 5.8, 6.4, 6.6					1.7, 2.2	
Affordable Housing Support Service/Fair Housing							
Environmental Sensitivity	3.6, 9.6, 9.7, 9.8			2.12, 3.1, 4.1	4.12	1.11, 1.12	

HOUSING ELEMENT IMPLEMENTATION PROGRAM

The Housing Element Implementation Program provides specific actions the City intends to undertake to achieve the goals and policies of the Element. This section describes the City's past performances, identifies quantified Five-Year objectives, available financial resources and provides a list of specific programs the City intends to pursue. Housing programs include both those currently in operation in the City and new programs added to address unmet housing needs. A description of each program is provided, along with the program funding source, responsible agency, and time frame for implementation.

REVIEW OF PAST PERFORMANCE

This section will outline the progress, effectiveness, and appropriateness of the 1984 Housing Element affordable housing development objectives.

State law establishes a five-year cycle regulating housing element updates. In compliance with the SCAG cycle, the Tustin Housing Element was updated in 1989 at which time it was found to be in compliance with State law, and will be updated again in 1994. The City of Tustin is currently undertaking a comprehensive General Plan update, and the Housing Element is being updated now to ensure consistency with other General Plan Elements, as well as to address recent changes in State law. However, in order to keep the element on track with the SCAG five year cycle, certain parts of this element are referenced against that five year planning cycle. For this reason, discussion relating to past accomplishments refers to accomplishment during the 1984-1989 planning period and the quantified objectives in the element are objectives sought to be achieved over the 1989 through 1994 planning period.

Review of 1983-1988 Objectives

The SCAG Regional Housing Allocation Model indicated a new construction need in Tustin by 1988 of 2,952 units, of which 506 units were for very low income households, 633 for low income, 727 for moderate income and 1,086 upper income. The City,

however, in the 1984 Housing Element, identified specific objectives they felt could be met based on available private and public funding resources. The following objectives set forth in Table H-6 were the projected numbers and type of units to be constructed within the time frame of the 1984 Housing Element.

TABLE H-6
1984-1989 HOUSING PRODUCTION GOALS

	Very Low	Low	Moderate	Total
New Construction				
East Tustin Subdivision	--	100	500	600
Senior Citizen Housing (special needs)	10	50	50	110
Granny Flats/Second Units	5	10	--	15
Apartments (in-fill and Redevelopment Projects)	20	55	150	225
Apartments (integration within sphere of influence - outside Tustin)	--	150	--	150
TOTAL UNITS	35	365	700	1,100
Maintenance and Rehabilitation	--	--	--	50
Conversion of Affordability	--	--	--	780

The following discussion will outline the progress, effectiveness and appropriateness of 1984 Housing Element Objectives.

East Tustin

The East Tustin Ranch Area had set out projections of 100 new units for low-income residents, and 500 new units for moderate-income residents, for a total of 600 units. As of January 1, 1989, 69 units for low-income residents were achieved. The remaining units held for low-income and moderate income persons were under construction during preparation of the 1989 Housing Element and will be completed by the end of 1989. These numbers fell short of the 1984 objectives of 100 low and 500 moderate-income housing units due to delays in the start of

construction by the property owner and the economy for property loans. This schedule is anticipated to be back on track and all anticipated units will be constructed in the 1989-1994 planning period. By the time the East Tustin Ranch project is completed, the amount of projected low- and moderate-income units is projected to exceed the original figures in the 1984 element as follows: 169 low-income units and 500 moderate-income units.

Senior Citizen Housing Needs

As of 1989, staff has calculated the following units available for seniors:

1. 67 Section 8 (Existing Housing Certificates) for very low-income;
2. 20 units of (Senior Apartments at 17442 Mitchell Avenue); 15 units for low-income (Tustin Royale 1682 Bryan Avenue);
3. Unknown number of elderly residing at Orange Gardens Apartments Complex;
4. 16 units for low-income seniors (530 "C" Street--Tustin Courts).

The number of units available for moderate-income seniors is unknown. Because of the availability of apartments and mobile homes in the City, hundreds of units in the City are available for senior citizens at moderate rents. However, the total number of new units provided in the 1984-89 planning period was 51 units.

What we have learned from this experience is that the City needs to incorporate a monitoring system that would track available housing types and costs for senior housing that might suit the needs of seniors.

Reasons for not meeting the 1984 objectives for senior housing of 110 units (only 51 known units provided in the 1984-1989 period) can be attributed to several factors. One of these is the economy and the interest rates for housing and construction loans. Typically the housing market slows during these periods and such a slow down occurred from 1982-1985. Secondly, while the City continues to provide services and programs, there has

been a general lack of participation from the development community resulting in a lack of interest to provide such units.

Granny Flats and Second Units

According to City records, two (2) Granny Flats were constructed and six (6) second units were constructed during the 1984-89 review period. These figures fell short of the anticipated 15 units. There was an assumption that Granny Flats would be a very popular method of supplying additional housing for very low- and low-income persons (especially seniors). The Tustin Zoning Code also allows second single-family units with a conditional use permit and second units with no kitchens (guest rooms). Unfortunately, despite incentives provided by the City, this housing type has proven not to be popular method of supplying additional housing.

What we have learned from this type of program is that it is difficult to monitor because the units are on private property and there is no guarantee of whether these types of units are housing units for relatives or rental units. Even if a monitoring program were initiated, it would take a great deal of cooperation on the part of these private homeowners to agree in advance or over time to hold units for lower income individuals. If they choose not to cooperate, the City would be legally unable to force compliance.

While the program has been popularly recognized by the residential property owners, the costs of construction and the 1982-1985 economic slow down may have deterred owners from participating. The City regulations on providing such units were designed to be flexible enough to accommodate existing lot configurations and yet ensure compatibility of design. Although such units require a Use Permit for approval, the fees could be waived for projects where the owner agrees to hold the unit for low income use. In the future, the City will encourage such projects and attempt to ensure maintenance of affordable units through use of CC&R's which guarantee affordability of the unit in perpetuity.

Apartments (In-Fill Units and Redevelopment Projects)

Review of City records indicates 13 apartment projects with a total of 1,078 apartment units were constructed in Tustin during

the 1984-1989 time period. Eight of these projects were developed within redevelopment project areas. Over ten percent, or 174 units, developed during this period were rent restricted to lower income households. In addition, over 150 very low income households were receiving Section 8 rent certificates or vouchers during this period. These figures indicate the City well exceeded its goals for construction of 20 very low, 55 low, and 150 moderate income apartment units.

Apartments (Integration Within Sphere of Influence)

The City's goal for the unincorporated area of Orange County within Tustin's sphere of influence was a very unrealistic goal for the following reasons: 1) The City of Tustin has no land use jurisdiction over the unincorporated areas; 2) The County of Orange has its own goals and objectives; 3) The County of Orange adopted a North Tustin Specific Plan which requires that all single-family land uses remain at a very-low-density with parcels that front on Newport to be garden office. Very few multi-family (apartment) units are located in that area. Recognizing what we believe to be obvious exclusionary policies in this County area, North Tustin, the City has previously requested that a portion of our fair share "affordable housing" distribution be reallocated to the portion of County area within our sphere of influence.

Annexations of unincorporated County territory are regulated by State Law (Knox-Cortese Act) which specifies that pre-annexation zoning agreements may be formulated. Based on the City's conversations with major resident representatives in potential annexation areas, there may not be support for a large annexation of the City's Sphere of Influence without such an agreement. This could severely limit the City of Tustin's ability to pre-zone potential annexation areas to higher intensity land uses so that more residential or commercial land uses could be built, particularly with this being the major agreement fueling residents in opposition to annexation. Based upon the existing land uses and zoning in the northern County areas (North Tustin) it is legally impossible to identify programs which would intensify land uses to promote affordable housing. Such changes must be accomplished by the County prior to annexation. Also, most of this area was only built out to low-density single-family uses in the last 10-20 years with only small vacant, remnant parcels remaining.

Maintenance and Rehabilitation of Existing Units

According to City records and information supplied by the County of Orange Home Improvement Program, the following number of units were rehabilitated between 1984-1989 in the City of Tustin utilizing Community Development Block Grant (CDBG) Funds:

18	Owner-occupied homes
31	Mobile Homes
5	Secured barns
76	Rental rehabilitations
130	Total

The City first began receiving CDBG rehabilitation funds in 1983 and by 1984 was attempting to project the success of this program. The success of the rehabilitation program has been largely in the rental rehabilitation and mobile home categories. What we have learned from this program is that there is a real need in the city for such rehabilitation programs. In the future, the City should attempt to expand the program by requesting larger grants for these housing services. However, since the program is administered by the County and funded with Federal grants, the City is unsure as to the future availability of funding and has therefore projected conservatively over the next program period. Tustin will, however, become an entitlement jurisdiction in Fiscal Year 93/94, and receive CDBG funds directly from HUD. HUD has not as yet provided the City with funding projections, but it is likely the City will receive an increase in current funding levels, thereby providing for expansion for rehabilitation program activities.

Current Housing Program Achievements and Recent Actions

In addition to a review of performance in achieving 1983-84 objectives, the City has taken a number of actions to further the provision of housing and improve the City's existing housing stock. Many of these actions are described below.

Provision of Adequate Sites: As described in the section on Housing Opportunities, adequate sites have been designated in the General Plan at a wide variety of densities which would permit the construction of 7,370 additional units. A large part

of this capacity was made available by annexation in the early 80s and adoption of the East Tustin Specific Plan in 1986. The East Tustin Specific Plan authorizes development of a total of 7,950 dwelling units; over two-thirds of these units have received approvals, of which one-quarter have been built.

Mixed-Use Zoning and Design Flexibility: The City has adopted Planned Community Districts and Specific Plans which authorize and encourage mixed-use developments and provide for flexibility and innovative approaches in design. In this regard, the remaining 5,943 units in the East Tustin Specific Plan area have yet to be built. The use of the Planned Community zoning, especially in East Tustin, has resulted in use of zero-lot line configurations and clustered developments which help to reduce development costs and make housing more affordable.

Equity-Sharing: An equity-sharing ownership program has been approved and is operating at the Rancho San Juan condominium conversion located on Red Hill Avenue at San Juan.

Secondary Residential Units: The Zoning Ordinance has been amended to authorize granny flats in the E-4 Estate Residential District and secondary residential dwelling units in the R-1 Single-family Residential District which are subject to a use permit.

Condominium Conversion: The City has adopted a condominium conversion ordinance requiring developers converting apartments to condominiums to process a use permit, provide relocation assistance, and/or to provide incentives and assistance for purchase of the units by lower-income households.

Enforcement of Building and Housing Codes: The enforcement of building and housing codes is an on-going process with notification to taxing agencies upon failure to gain code compliance from the property owner. A minimum of 300 resolved building-related cases are currently resolved per year.

Pre-Application Conferences: The Community Development Department has established procedures for pre-application conferences and processing procedures to expedite permit processing. All applications for new construction benefit from this service.

Fair Housing: The Orange County Fair Housing Council provides services to the City of Tustin to assure equal housing

opportunities within the City. Complaints are referred to the Orange County Agency. As with tenant protection services, the resolution of fair housing disputes are processed by the County Agency.

Shared-Housing: A shared-housing program is available designed for individuals seeking an alternative to their living arrangement by sharing space with another. The program is funded in part by the Feedback Foundation, Inc. as part of TLC (Transportation Lunch and Counseling) and the Orange County Housing Authority. The City of Tustin provides support for the program at the Tustin Senior Center.

Provisions for Mobile Homes: There are seven (7) mobile home parks within the City limits. Mobile homes or manufactured homes on individual lots are subject to a use permit. The City has adopted a mobile home park zone that establishes density and development standards which allow for travel trailer parks at 15 units per acre and mobile home parks at 10 per acre (excluding public streets). As of April, 1992, the City has a total of 427 mobile homes.

Housing Authority: The City contracts with the Orange County Housing Authority for the development and operation of federally assisted low and moderate income housing programs.

Permit Processing and Coordination: The processing of permits for low and moderate income housing is fast-tracked with low and moderate income housing permits being given priority over other permit applications.

The Community Development Department is the central clearinghouse and individuals are assigned the responsibility for expediting development permits required from various departments and agencies.

Article 34 Election: A referendum election was conducted in June, 1980, which authorized public housing for senior and lower income households in Tustin, subject to certain conditions.

HCDA Funds: Residents of the City are beneficiaries of HCDA Block Grants administered by the County of Orange. Funding for such projects varies from year to year. Under current contract which is effective until 1991, a minimum of \$100,000 in funds are annually anticipated.

Rental Assistance: Elderly, low and very low income residents of the City are eligible to apply for Section 8 rental assistance certificates and voucher certificate program assistance funds allocated through the Orange County Housing Authority. The total amount allocated to each household varies based on rental rates, household size and income. Maintaining existing and establishing new certificates depends on Federal funds.

State Home-Ownership Assistance: The state program in homeownership assistance has been used for first-time home buyers. This program is administered by the County Administrative Office.

Tax Increment Financing: The South/Central and Town Center Redevelopment Projects provide for a 20% set-aside of tax increments to assist in providing housing accommodations for low-income families. Housing projects for low-income units proposed in these areas may apply for financial assistance through the agency for these set-aside funds.

Affordable Senior Housing Project: Twenty units of affordable housing for Seniors are located at 17142 Mitchell Avenue. This affordable project was approved with a density bonus and reduced parking requirements.

Senior Citizen Board and Care Facility: A senior citizen board and care facility is in operation at 1282 Bryan Avenue. This project was funded with Industrial Development Bond money for 85 units of which 15 are reserved for low- to moderate-income persons.

Energy Conservation: All new construction is subject to the state energy conservation requirements (Title 24) as a condition for the issuance of a building permit. All new units are subject to these requirements. In addition, the City requires common facilities in the East Tustin Area to be pre-wired for passive solar installations.

Housing for the Handicapped: New multi-family housing units and apartment conversions to condominiums are required to comply with State specifications for accommodation of the handicapped.

IDENTIFICATION OF AFFORDABLE HOUSING RESOURCES

The City has prepared a Comprehensive Report identifying and describing all funding programs available to the City of Tustin and Tustin Redevelopment Agency to assist in the meeting of the City's housing needs. Included in the report are descriptions of a wide variety of major housing assistance programs available from federal and state agencies and private lending institutions. The report emphasizes family income targeted by each program and eligible programs.

The City has also projected annual CDBG, HOME, and Redevelopment Agency Housing Set-Aside fund revenues to the City and Redevelopment Agency of Tustin over a five year time frame. These projections indicate that Tustin will have available approximately \$3.5 million in housing funds from these three sources through July 1, 1994.

Identification of Resources for Preservation of At Risk Units

This section discusses two types of resources available for preserving at risk units: a) financial resources potentially available to purchase or supplement existing units, or to build replacement housing, and b) entities with the interest and ability to purchase and/or manage units at risk.

Financing/Subsidy Resources: There are a variety of potential funding sources for potential acquisition, subsidization or replacement of units at risk. Due to both the high costs of developing and preserving housing and limitations on both the amount and uses of funds, a variety of funding sources may be required.

HUD Funds: Subject to appropriations, HUD will provide most - and in some cases all - of the financial incentives necessary for acquisition of federally subsidized, at-risk projects by non-profit organizations, tenants, and local governments. These incentives include the following:

- Project-based Section 8 contracts, with HUD-subsidized rents set at levels high enough to provide an eight percent return to owners who retain the project or to cover debt service on an acquisition loan for new purchasers;

- Grants to non-profit buyers that would fill any gap between fair market rent or local market rent (whichever is higher) and allowable rents; and
- Mortgage insurance both for equity take-out loans and acquisition loans. Insured equity take-out loans are limited to 70 percent of equity, while acquisition loans are available at 95 percent of equity.

Redevelopment Set-Aside: State law requires redevelopment agencies to set aside at least 20 percent of tax increment revenues for increasing and improving the community's supply of low and moderate income housing, unless certain exceptions apply. The Tustin set aside fund currently has a projected 1992-1993 unencumbered balance of approximately \$1.8 million from the South Central Project Area. Projections through fiscal year 1998/99 indicate an estimated \$12.2 million in set-aside funds in the Town Center and South Central Project Areas combined. The City is in the process of studying how best to use those funds to increase housing opportunities. It is anticipated that some of this money may go to the provision of low interest loans and could be used to provide financial incentives for at-risk projects where federal assistance is insufficient.

CDBG Funds: Through the Community Development Block Grant (CDBG) program, HUD provides funds to local governments for funding a wide range of community development activities. CDBG funds are subject to certain restrictions and can not be used for new construction of housing but can be used for rehabilitation and acquisition of existing housing. Tustin's CDBG funds are administered through Orange County. Last year the City received \$154,552 in CDBG funds, of which \$80,000 was allocated towards housing rehabilitation. If this amount remains constant, it could potentially provide \$463,656 over the remaining three years of the planning period of this analysis, or \$240,000 for housing programs. Tustin will become an entitlement jurisdiction in Fiscal Year 1993/94 and administer CDBG funds directly, however, HUD has not yet prepared estimates of the City's future CDBG allocation amount.

There are no additional CDBG funded programs administered by the County that the City participates in that could be used for the acquisition or rehabilitation of the units at risk.

Housing Authority Reserves: Another potential source of funding are the reserves of housing authorities. The Orange County

Housing Authority currently has roughly \$8.5 million to use to provide housing opportunities for low and moderate income households throughout the County. This money is subject to some restrictions and priority is given to projects which provide for the leverage and recycling of funds.

General Revenues: The City does not currently fund housing programs out of general revenue funds and does not have any general revenue funds set aside for housing.

Orange County Affordable Housing Clearinghouse: The Clearinghouse is a consortium of lending institutions and community groups focused on providing funds for affordable housing through team lending. Sixteen lending institutions are currently members of the coalition. Because the coalition is new, it does not yet have a track record in the community. However the financial assets and expertise of coalition members indicate that this should be a significant source of low-income housing funds in Orange County. A representative of the Clearinghouse indicated that the Clearinghouse would be very interested in participating in the financing of "at risk" projects in Tustin.

Administrative Resources: According to the State Department of Housing and Community Development, three nonprofit agencies in Orange County have expressed interest in purchasing and or managing at risk or replacement units in the Tustin area.

The Orange County Community Housing Corporation (OCCHC): OCCHC is the oldest and largest nonprofit affordable housing developer in Orange County. With assets exceeding \$6.6 million, OCCHC has been involved in 14 developments throughout Orange County. OCCHC participates in the management as well as the development of low income housing and may have interest in at risk units in Tustin.

Civic Center Barrio Housing Corporation: Civic Center Barrio Housing Corporation also has considerable experience in and resources for the development and or management of low income housing and has also expressed interest in at risk units in Tustin. Barrio Housing owns and operates over 130 housing units in Orange County and San Diego County and has been involved in the development of over 400 additional units. Barrio Housing has staff of 3 full time employees and has been operating in Orange County for 16 years.

Council of Orange County, Society of Saint Vincent De Paul: The Society of Saint Vincent De Paul has also expressed interest in "at risk" units in Tustin. The Society provides many social services in Orange County such as food distribution and medical services. The Society is also in the process of developing a congregate housing project in Orange County and plans to continue to expand its housing operations. Including the value of donated time and goods, the Society has an annual revenue of \$9.8 million and employs a staff of 75 persons.

FIVE YEAR QUANTIFIED OBJECTIVES (1989-1994)

State law requires the City to accommodate its fair share of the State's housing need. In doing so, the City must quantify the number of homes that are projected to be built and conserved. The following quantified objectives are adopted as guidelines toward meeting Tustin's housing needs through 1994. While the Land Use Plan provides adequate sites to fulfill needs established by the Regional Housing Needs Assessment, construction of new units will depend upon the timing of the landowner and developer for the submission of subdivision plans to meet market demands. Housing subsidies will depend upon the availability of government funds - Federal, State, and local. Redevelopment projects are subject to the interests of private developers. The construction of secondary units depends upon the desires of the property owners as related to family needs for housing and economic resources. The achievement of the housing objectives are thus dependent upon the private sector and other governmental agencies. The responsibility of the City is to encourage the construction of affordable housing by providing programs and assistance to developers and to assist in its creation by facilitating the review and approval of development permits.

Future Housing Needs/Provision of Additional Units Pursuant to RHNA

New Construction Objectives - Total 2085 units: 390 very low income, 484 low income, 487 moderate income, 724 high income.

The Regional Housing Needs Assessment figures for Tustin (as revised) show that an additional 2,085 housing units are needed through 1994. Of these units, 1,751, or 84%, are anticipated to

be needed to accommodate growth in the number of Tustin households. An additional 267 units are needed to adjust for the ideal vacancy factor, and 67 units to adjust for units anticipated to be demolished, for a total of 2,085 units.

As described under the Housing Opportunities Section, the Tustin Land Use Plan provides for a net increase in 7,370 dwelling units under General Plan buildout, more than adequate capacity to fulfill the City's regional housing needs.

The City has a remaining capacity for 2,286 units at densities up to 25 units per acre in the High Density Residential and Planned Community High Density Residential categories. The City will strive to ensure at least 484 of these units are developed at densities of 18 units an acre in an attempt to assist in fulfillment of low income needs, and 390 units are developed at 25 units an acre in an attempt to assist in fulfillment of very low income needs. However, given the current Affordability Gap in the City of Tustin, the City and Redevelopment Agency will need to further assist in the development of affordable housing through programs set forth in the Housing Element, including the East Tustin Affordable Housing Program, density bonus, rental assistance, and utilization Community Development Block funds and 20 percent Redevelopment Agency Housing set-aside funds.

As part of the East Tustin Affordable Housing Program, a total of 100 low-income units and 500 moderate income units are to be required to be provided in the East Tustin Area.

In addition to increased densities to provide affordability, very-low income units are also provided through the use of Section 8 certificates and other Federal, State and County rental assistance programs.

It is important to note that while the quantified objectives of the RHNA are required to be part of the Housing Element and the City will strive to attain these objectives, Tustin cannot guarantee that these needs will be met given its own limited financial resources and the present Affordability Gap in the City of Tustin. Satisfaction of the City's regional housing needs will partially depend upon cooperation of private funding sources and the funding levels of the State, Federal, and County programs that are used to support the needs of the very-low, low and moderate-income persons. Additionally, outside economic forces heavily influence the housing market. The program

references used to further the attainment of these goals are listed below.

(Programs - Existing: 1, 3, 4, 11, 15-22; New: 23-25, 28, 30-32, 35, 41-45)

Maintenance and Rehabilitation of Existing Units

Rehabilitation Objectives - Minimum 80 units: 15 very low income, 19 low income, 19 moderate income, 27 other

Participation in the CDBG program, as administered by Orange County, with funds available for renovation and rehabilitation of apartments, single-family dwellings and mobile homes during the five year period of this element should accommodate the rehabilitation of at least 80 housing units. In addition, Agency Housing Set-Aside funds will be committed to assisting lower and moderate income households in rehabilitation.

(Programs - Existing: 8, 10, 17 and 19; New: 26, 29)

Conservation of Affordable Housing

Conservation Objectives - Total 960 Units: 384 very low income, 576 low income.

The means by which the City of Tustin has determined to conserve affordable housing units includes the maintenance of the mobile home park zone, restrictions on R-3 zone uses, (condominium conversion restrictions) providing access to sources of funds for housing assistance to low income residents, and preservation of assisted housing at risk through the 1989-1994 time frame. Some of these homes will be removed for freeway widening by Cal Trans, however the remaining units will stay in the MHP zone.

(Programs - Existing: 2, 5, 6, 7, 13; New: 31)

The R-3 zone has certain restrictions to conserve the number of apartments in the City. New apartments are allowed by right in this zone. Apartment-to-condominium conversions require a use permit that encourages conservation of apartment uses. The construction of new condominiums in this zone, also requires a use permit. These requirements enable the Tustin Community

Development Department to monitor the sources of affordable housing units in the City.

(Programs - Existing: 4, 5, 6, 7; New: 31)

In 1988, the City adopted a Cultural Resources district to facilitate historic preservation and to conserve potentially historic residential units. This program specifically limits rezoning of residential areas to commercial uses by limiting lot sizes and establishing residential oriented policies. The program also includes a Historic Survey (completed in Mid 1989) which can be used to declare historic landmarks which may be rehabilitated through the use of State and Federal historic preservation funds.

(Programs - Existing: 10; New: 26, 36)

Tustin has two assisted housing projects - Orange Gardens and Tustin Gardens - at risk of converting to non-lower income use prior to July 1999. These two projects combined provide 260 low income housing units. If the project owners choose to convert the projects to market rate housing, financial and administrative resources are available to preserve the units as low income. The City's objective will be to preserve all 260 units through 1999 but in particular 160 units at Orange Gardens in the 1989-1994 time frame.

(Programs - New: 40)

HOUSING PROGRAMS

The following identifies both existing and new housing programs to be implemented in Tustin during the 1989-1994 period.

Ongoing Implementation Programs

A review of suggested implementation measures contained in the General Plan Guidelines, Office of Local Government Affairs, as revised December, 1982, reveals that the City has developed and utilized the following programs and will continue to use them as on-going programs for the purpose of providing assistance to low and moderate income families in housing accommodations:

1. Mixed-use Zoning: Continue to utilize Planned Community Districts and Specific Plans to authorize and encourage mixed-use developments.

Responsible Agency: Community Development Department, City Council

Funding Source: None necessary

Time Frame: Ongoing.

Related Policies: 1.1, 1.9, 1.10

Expected Results: A minimum of 5,000 units in East Tustin within the 1989-94 planning period.

2. Mobile Homes: Continue to maintain the City's mobile home park zone and process conditional use permit applications as received for manufactured homes.

Responsible Agency: Community Development Department, City Council

Funding Source: None necessary

Time Frame: Ongoing

Related Policies: 1.1, 1.3

Expected Results: Maintain existing mobile homes.

3. Secondary Residential Units: Continue to provide opportunities for affordable granny flats and secondary residential dwelling units in the Single-family Residential District lots through existing Zoning Ordinance provisions.

Responsible Agency: Community Development Department, City Council

Funding Source: City General Fund

Time Frame: Ongoing.

Related Policies: 1.1, 1.7, 1.14

Expected Results: 10 units during the 1989-94 planning period.

4. Condominium Conversions: Continue to require developers converting apartments to condominiums to process a use permit, provide relocation assistance, and/or to provide incentives and assistance for purchase of the units by low and moderate income households.

Responsible Agency: Community Development Department, City Council

Funding Source: City General Fund

Time Frame: Ongoing.

Related Policies: 3.1, 3.2, 3.3

Expected Results: 20 low income units conserved.

5. Replacement Housing: The Redevelopment Agency shall replace housing units demolished when the Agency undertakes a project pursuant to the requirements of the California Community Redevelopment Law. In terms of replacement housing for units lost as a result of freeway widening, the City shall explore requests for CalTrans funds for replacement housing.

Responsible Agency: Redevelopment Agency, Community Development Department

Funding Source: Redevelopment Agency Funds, CalTrans Funds.

Time Frame: Ongoing.

Related Policies: 2.6, Goal 5

Expected Results: No current plans for demolition.

6. Tenant Protection: The protection of tenant rights is incorporated within State law and rent control is believed to be best controlled by the supply and demand of the market place. Encourage the County to continue its contract under the "Urban

County" program for the provision of counseling and dispute resolution services by the Fair Housing Agency.

Responsible Agency: County, Community Development Department

Funding Source: CDBG funds

Time Frame: Ongoing.

Related Policies: 2.1, 2.2, 2.4

Expected Results: A minimum of 20 existing or desired Tustin residents assisted through 1994.

7. Deed Restrictions: Require appropriate deed restrictions to ensure continued affordability for low or moderate income housing constructed or rehabilitated with the assistance of any public or Redevelopment Agency funds as may be legally required by the use of such funds.

Responsible Agency: Community Development Department, Redevelopment Agency, City Council

Funding Source: None necessary

Time Frame: Ongoing.

Related Policies: Goal 4

Expected Results: Restrictions imposed on 100 units by 1994.

8. Enforcement of Building and Housing Codes: Continue to enforce building and housing codes including notification of taxing agencies upon failure to gain code compliance from the property owner.

Responsible Agency: Community Development Department

Funding Source: City General Fund, Redevelopment Agency

Time Frame: Ongoing.

Related Policies: 5.3, 5.4

Expected Results: 300 cases per year; 1,500 cases by 1994.

9. Pre-application Conferences: Continue to utilize procedures for pre-application conferences and processing procedures to expedite permit processing. Approximately 100 projects per year may use this system.

Responsible Agency: Community Development Department

Funding Source: City General Fund

Time Frame: Approximately 100 cases per year, minimum 500 cases by 1994.

Related Policies: 1.12

Expected Results: All applicants to City benefit from this service.

10. Housing Rehabilitation: Allocate available CDBG and Redevelopment Agency funds to finance both public improvements and rehabilitation of residential units in target areas within the City.

Responsible Agency: Community Development Department, County of Orange, Federal Department of Housing and Urban Development.

Funding Source: CDBG and Redevelopment Agency funds.

Time Frame: Ongoing.

Related Policies: 1.2, 5.1, 5.2

Expected Results: 80 units by 1994.

11. Fair Housing: In addition to the State Department of Fair Employment and Housing, continue the provision of services by the Orange County Fair Housing Council to the City of Tustin to assure equal housing opportunities within the City. Complaints are referred to the Orange County Agency.

Responsible Agency: Orange County Fair Housing Council,
County of Orange

Funding Source: County CDBG funds

Time Frame: Ongoing.

Related Policies: 2.1, 2.2, 2.4

Expected Results: Processing of all complaints received.

12. Shared-Housing: Continue to provide coordination and support to a home sharing program funded in part by the Feedback Foundation, Inc. as part of TLC (Transportation Lunch and Counseling) and the Orange County Housing Authority.

Responsible Agency: TLC, Orange County Housing Authority,
and Community Services Department

Funding Source: County CDBG funds

Related Policies: 2.3

Expected Results: 5 cases per year or 25 cases by 1994.

Time Frame: Ongoing.

13. Housing Authority: Contracts with the Orange County Housing Authority where necessary for the development and operation of federally assisted low- and moderate-income housing programs.

Responsible Agency: Orange County Housing Authority

Funding Source: HUD

Time Frame: Ongoing, depending on Federal Funding.

Related Policies: 1.5, 1.16, 1.17

Expected Results: On an as-needed basis.

14. Permit Processing and Coordination: Ensure that processing of permits for low- and moderate-income housing are fast-tracked with low and moderate income housing permits being given priority over other permit applications. Continue the services of the City's Community Development Department as a central clearinghouse with individuals assigned the responsibility of expediting development permits required from various departments and agencies.

Responsible Agency: Community Development

Funding Source: None necessary

Time Frame: Ongoing.

Related Policies: 1.12

Expected Results: Prioritization of low and moderate income projects depends on number of projects processed. Processing of approximately 100 new cases per year and 500 cases by 1994 is anticipated

15. Rental Assistance: Encourage the availability of Section 8 rental assistance certificates and voucher certificate program assistance funds through the Orange County Housing Authority. To encourage the maintenance of existing and establishment of new certificates, support the County's efforts to obtain continued Federal funding.

Responsible Agency: County of Orange Housing Authority

Funding Source: HUD

Time Frame: Ongoing as funding available

Related Policies: 4.1, 4.2

Expected Results: 10 new certificates by 1994; letters of support to County

16. State Home-Ownership Assistance: Provide support for the State Home-Ownership Assistance program used for first-time home buyers in Tustin.

Responsible Agency: State of California and County of Orange

Funding Source: California Housing Finance Agency

Time Frame: Ongoing as funding available.

Related Policies: 3.1, 3.3

Expected Results: 50 cases by 1994.

17. Tax Increment Financing: Provide 20% housing set-aside tax increment funds from the South Central and Town Center Redevelopment Projects, where available, to assist in providing housing accommodations for low and moderate income households.

Responsible Agency: Community Development

Funding Source: Redevelopment Set-Aside Fund

Time Frame: Ongoing as funding available

Related Policies: 1.6, 1.13, 3.2, 4.2

Expected Results: Assistance to 5 projects

18. Energy Conservation: Require all new construction to be subject to State energy conservation requirements (Title 24) as a condition for the issuance of a building permit.

Responsible Agency: Community Development Department

Funding Source: None necessary

Time Frame: Ongoing

Related Policies: 6.2

Expected Results: All new units in City in 1989-1994 planning period.

19. Housing for the Handicapped: Require new multi-family housing units and apartment conversions to condominiums to comply with State specifications for accommodation of the handicapped.

Responsible Agency: Community Development Department

Funding Source: None necessary

Time Frame: Ongoing

Related Policies: 1.14

Expected Results: 25 units by 1994.

20. Affordable Senior Housing Project and Senior Board and Care Facility: Encourage the maintenance of twenty units of affordable housing for Seniors located at 17142 Mitchell Avenue and a senior citizen board and care facility in operation at 1282 Bryan Avenue, funded with Industrial Development Bonds.

Responsible Agency: Community Development Department

Funding Source: None necessary

Time Frame: Ongoing.

Related Policies: 5.1, 5.2, 5.3, 5.4

Expected Results: Maintain 20 dwelling units between 1989-1994 and 20 affordable units at the board and care facility in same time period.

21. Non-profit Shelters for Homeless Women and Children: Encourage the continuation of the two (2) Sheepfold homes in Tustin which provide housing facilities for homeless women and children. These homes are located in single-family neighborhoods and provide a much-needed service for homeless women and children.

Responsible Agency: Various Non-Profit Organizations

Funding Source: Variety of funds

Time Frame: Ongoing.

Related Policies: 1.15, 1.16

Expected Results: Retain current bed counts.

22. Pre-Wiring for Passive Solar: Continue to require all common facilities in the East Tustin Area to be pre-wired for passive solar installations.

Responsible Agency: City of Tustin Building Division.

Funding Source: None necessary

Time Frame: Through complete development of East Tustin

Related Policies: 6.2, 6.3

Expected Results: Applicable to all East Tustin developments.

New and Expanded Implementation Programs

23. Housing Opportunities for All Economic Segments: Monitor the implementation of the affordable housing program adopted as a part of the East Tustin Specific Plan.

Responsible Agency: Private developers in East Tustin; Community Development Department

Funding Source: None

Time Frame: Ongoing

Related Policies: 1.1, 1.8, 1.9, 1.10, 1.12

Expected Results: 100 low and 500 moderate income units by 1994.

24. Bonding Programs: Study recent bonding authority legislation and encourage utilization of State or County issue of these bonds. In keeping with the community goal of encouraging owner-occupied housing units, place special emphasis on those bonding programs that promote

homeownership, such as SB 1862, AB 3507 and Section 235 of the Housing and Urban Recovery Act of 1983. Consider those programs, where needed, to provide for rental-occupied construction.

Responsible Agency: City of Tustin

Funding Source: State and Municipal Bonds

Time Frame: Ongoing.

Related Policies: 1.12, 3.3

Expected Results: Complete analysis of available programs and applicability to Tustin by 1994.

25. Land Cost Write-Downs: Utilize 20% housing set-aside funds as subsidies (i.e., land write downs, acquisition and rehabilitation assistance grants and loans, etc.) from the South/Central Redevelopment Project to reduce the affordability gap for developing new and rehabilitating existing owner and rental units for low and moderate income households.

Responsible Agency: Redevelopment Agency

Funding Source: Redevelopment Agency Housing Set-Aside Fund

Time Frame: Ongoing and funds available

Related Policies: 1.13, 3.2

Expected Results: Preparation of a comprehensive affordable housing strategy that identifies actual funds to be allocated for subsidy. At minimum, it is expected that 2.5 million will be allocated for assistance through 1994.

26. CDBG Funds for Rehabilitation: Continue to make applications for CDBG Funds through the Urban County Program to be administered by the Orange County Environmental Management Agency for the rehabilitation of single-family, mobile homes and multi-family units. In Federal Fiscal Year 1993-94, the City is expected to become an entitlement city and will be able to apply directly to HUD.

Promote the availability of these funds for rehabilitation by newspaper articles, announcements in Tustin Today (a City publication that is mailed to all households), spot announcements on City water bills, and direct mailing to property owners.

Responsible Agency: City of Tustin, County of Orange

Funding Source: CDBG

Time Frame: Ongoing as program is reauthorized

Related Policies: 1.2, 5.1, 5.2, 5.3, 5.4

Expected Results: Receipt of up to \$425,000 in Grant funds by 1994.

27. Economic Integration within Sphere of Influence: Request that the Orange County Planning Commission and the Environmental Management Agency notice the City of Tustin of any proposed development activities within Tustin's sphere of influence. When suitable sites are identified, the City will request the implementation of the State, County and City housing objectives for affordable housing to be incorporated within the development plans.

Responsible Agency: County of Orange

Funding Source: None

Time Frame: Ongoing, as applicable to County activities.

Related Policies: 1.1, 1.4, 1.5

Expected Results: The City has no jurisdiction over County area.

28. Senior Citizen Housing: Continue to identify sites that are suitable for senior citizen housing projects. These sites will be promoted for private development and applications will be made for any available subsidy funds.

Responsible Agency: City of Tustin, Redevelopment Agency

Funding Source: None necessary

Time Frame: Ongoing

Related Policies: 1.1, 1.14, 1.16

Expected Results: 25 units in the 1989-94 planning period.

29. Substandard Housing: Continue to identify substandard housing units and those that are otherwise identified as being a threat to the health and safety of the occupants. Take actions pursuant to the law to demolish, rebuild or correct the code violations.

Responsible Agency: City of Tustin, Redevelopment Agency

Funding Source: City General Fund, Redevelopment Agency funds

Time Frame: Ongoing

Related Policies: 5.3, 5.4

Expected Results: Correct all units identified.

30. Solar Energy and Conservation: Require that Environmental Impact Reports and subdivision plans address energy conservation measures and solar access. Include, as necessary, mitigating measures to ensure that developers implement the requirements of Title 24.

Responsible Agency: City of Tustin

Funding Source: None necessary

Time Frame: Ongoing

Related Policies: 6.3

Expected Results: All new units in City are subject to Title 24.

31. Recycling Single-Family Uses in R-3 Zones Into Multiple-Family Units: Continue to encourage developers to consolidate individual lots into larger cohesive developments. Density bonuses may be considered as an incentive to consolidate lots.

Responsible Agency: City of Tustin

Funding Source: None necessary

Time Frame: Ongoing

Related Policies: 1.12

Expected Results: 5 new units per year or 25 units during 5 year period.

32. Basic Housing: To reduce initial housing costs, continue to encourage the construction of housing units that incorporate design features providing the opportunity to expand habitable area as family needs change.

Responsible Agency: City of Tustin

Funding Source: None necessary

Time Frame: Ongoing.

Related Policies: 1.11, 1.14, 1.18

Expected Results: Support flexibility in housing design.

33. Ongoing Review of Housing Element Programs: From the date of adoption of the Housing Element, prepare an annual report to the Planning Commission assessing previous years accomplishments toward meeting Housing Element objectives. Submit the Annual Report to the State HCD.

Responsible Agency: City of Tustin, Community Development Department

Funding Source: None necessary

Time Frame: Ongoing

Related Policies: Goals 1-6; Policy 1.1

Expected Results: Annual Reports

34. Comprehensive Housing Affordability Strategy (CHAS): The County of Orange has developed a CHAS for all non-entitlement jurisdictions in the County, which includes the City of Tustin. Upon obtaining entitlement status under the CDBG program, the City of Tustin shall prepare a CHAS of its own which provides a comprehensive assessment of housing needs, a housing development plan incorporating Federal, State and local public and private resources, and a one year implementation plan.

Responsible Agency: County of Orange, Community Development Department

Funding Source: Variety of State, Federal, and local funding

Time Frame: Ongoing.

Related Policies: Goals 1-6; Policies 1.17, 5.2

Expected Results: Preparation of a CHAS by Federal Fiscal Year 1993-94.

35. Temporary Housing for Homeless: The City will support county-wide efforts to create a program for contribution of temporary housing opportunities for the homeless through voluntary contributions of CDBG funds by local jurisdictions in Orange County. In addition, explore additional program options to assist in the provision and funding services of temporary housing such as transitional housing, single room occupancy housing, a homeless prevention emergency loan program (i.e., for first month and last month's rent of security deposit).

Responsible Agency: County of Orange

Funding Source: General Fund, CDBG

Time Frame: Ongoing.

Related Policies: 1.15, 1.16

Expected Results: Support where needed; complete study of additional program options by 1994.

36. Cultural Resources District: There are a large number of structures in the City that were constructed before and after the turn of the century following the Columbus Tustin Subdivision in 1887. Continue to utilize the City's Cultural Resources Overlay District to safeguard the heritage of the City by preserving neighborhoods and structures which reflect the City's heritage and past. Through the District, promote the public and private enjoyment, use and preservation of culturally significant neighborhoods and structures. Continue to require that any alteration of a designated resource or construction improvements in the District conform to the requirements of the Cultural Resources Overlay District.

Responsible Agency: City of Tustin, Community Development Department

Funding Source: CDBG, City General Fund, State grants

Time Frame: Ongoing

Related Policies: Goal 5

Expected Results: 5 landmarks designated and 25 units rehabilitated by 1994.

37. Housing Referral Program: Continue to provide housing referral services to families in need of housing assistance and information. This program consists of three City departments disseminating information to the public at all times.

The Police Department refers homeless people to different agencies which provide shelters and food for various segments of the population.

The Community Services Department provides housing information and social service information to the senior citizen population.

The Community Development Department provides housing and social service information to all segments of the population during regular city hall business hours. This Department also serves as a clearinghouse for the Community Development Block Grant Program and represents the City at Housing Authority and OCHA Advisory Committee Meetings.

The three city departments utilize the following documents and also make these documents available to the public:

- Directory of Senior Citizen's Services - prepared by the Area Agency on Aging - Senior Citizen's Office.
- Senior Housing Resources - prepared by Orange County Shared Housing Steering Committee.
- Social Service Assistance Booklet - prepared by Connection Plus.
- Orange County Housing Directory - prepared by OCHA and the OCHA Advisory Committee.

Responsible Agency: City of Tustin

Funding Source: City General Fund, CDBG Funds

Time Frame: Ongoing

Related Policies: 2.2, 2.3, 2.4, 2.5, 2.6

Expected Results: Continue service

38. Zoning Studies: In order to facilitate the new construction goals of the 1989-1994 Regional Housing Needs Assessment, initiate studies to consider new programs to encourage and promote affordable housing. These studies include: (1) Potential for creating mixed-use zones in the City; (2) Incorporate mandatory inclusionary policies in the zoning provisions (either on or off-site) for housing units developed or rehabilitated by the Redevelopment Agency or by other public or private entities (since 30% of units developed by an Agency must be affordable and 15% of units developed or rehabilitated by other public or private entities); and (3) Consider relaxation of certain development standards and incentives that could be provided for projects which include affordable housing units.

Responsible Agency: City of Tustin

Funding Source: City General Fund, Redevelopment Agency funds

Time Frame: Ongoing

Related Policies: 1.1, 1.12

Expected Results: Complete studies by 1994 as staffing permits

39. Private Streets: The City of Tustin has adopted standards for private streets in new residential developments. To reduce construction costs, developers may be permitted to install private rather than public streets, wherever feasible.

Responsible Agency: City of Tustin

Funding Source: None necessary

Time Frame: Ongoing.

Related Policies: 1.18

Expected Results: Creation of private streets, wherever feasible.

40. Preservation of Assisted Housing: Tustin has two low income housing projects (Tustin Gardens and Orange Gardens) with a total of 260 units at risk of conversion to market rate prior to 1999. If project owners choose to convert the projects to market rate housing, coordinate the provision of financial and administrative resources to preserve these units as affordable housing. The following four specific actions will be taken to protect (or replace) at risk units:

a) Monitor units at risk; b) Provide tenant education; c) Work with nonprofits; and d) Earmark Funds. The following is a more thorough discussion of each action.

a) **Monitor Units at Risk:** Maintain contact with owners of at risk units as potential conversion dates approach to determine whether Section 8 contracts have been renewed or are planned to be renewed. Discuss with the owner of the "at risk" projects the City's desire to preserve the units as affordable.

b) **Tenant Education:** Work with tenants of at risk units in danger of converting. Provide tenants with information regarding potential tenant purchase of buildings including written information and any related workshops. Act as a liaison between tenants and nonprofits potentially involved in constructing or acquiring replacement housing. If existing

staff is not able to provide adequate staffing for this program, provide outside consultants to support the program.

- c) **Work With Nonprofits:** Work with nonprofit housing providers to explore and if appropriate, facilitate acquisition or replacement of at risk units.
- d) **Reserve Fund:** Earmark development housing set-aside funds to assist priority purchasers with the downpayment and closing costs associated with purchasing projects at risk. Continue to monitor other potential funding sources, such as State grants and HUD LIHPRHA funds.

Responsible Agency: City of Tustin, Community Development Department, Redevelopment Agency

Funding Source: CDBG, Redevelopment Housing Set-Aside Funds, State and Federal Funds

Time Frame: At least one year prior to potential expiration of low income use restrictions

Related Policies: 4.1, 4.2, 4.3, 4.4

Expected Results: Preserve 160 units by 1994 and an additional 100 units through 1999.

Removal of Governmental Constraints

Tustin will pursue the following programs to minimize governmental constraints to affordable housing production.

41. Building Codes: The State of California has determined that the over-riding value is the protection of the health and safety of residential occupants. Continue to adopt the Uniform Building Code pursuant to the state directives and where local amendments are proposed to reflect local climatic, geologic or topographic conditions, and minimize, wherever possible, impacts on provision of housing.

Responsible Agency: City of Tustin, Community Development Department

Funding Source: None necessary

Time Frame: Ongoing

Related Policies: 5.4

Expected Results: Amendments justified to State Uniform Building Code

42. Site Improvements: The requirement for the developer to construct site improvements often result in passing these costs on to the housing consumer. These costs are reflected in the cost of housing which eliminates an even greater proportion of the population from financially qualifying for the purchase of housing. The financing of public improvements by a special assessment district on a per parcel benefit basis may enable a greater proportion of the market to qualify for housing. Assessment district financing has been implemented in the East Tustin area and is being used to pay for public improvements. In creating any new assessment districts, an evaluation should be completed of the developer's activity to advance pay off bonds at the close of escrow.

Responsible Agency: City of Tustin

Funding Source: Developer funded

Time Frame: Ongoing.

Related Policies: 1.12

Expected Results: Difficult to verify

43. Fees, Exactions, and Permit Procedures: Consider waiving or modifying various fees or exactions normally required where such waiver will reduce the affordability gap associated with providing housing of the elderly and for low income households.

Responsible Agency: City of Tustin

Funding Source: City General Fund

Time Frame: Ongoing.

Related Policies: 1.12

Expected Results: Respond to all request received.

44. Environmental Constraints: Continue to alleviate the necessity of delays in processing, and mitigating requirements incorporated into the development plans by requiring program environmental impact reports (EIR) on all major development projects. A program EIR was developed for the East Tustin Specific Plan.

Responsible Agency: City of Tustin

Funding Source: Developer funded

Time Frame: On-going

Related Policies: 1.12

Expected Results: 2 major Program EIRs by 1994.

45. Density Bonus Program: The City of Tustin has a draft Density Bonus Policy. Applicants under State law may file for density bonuses when projects incorporate 25% of units for low income persons; 10% of units for very low-income units; or 50% of units for senior citizens. Upon receipt of the City's first application, pursuant to this provision of law, the City shall adopt a density bonus policy within 90 days of receipt of a density bonus application as required by law.

Responsible Agency: City of Tustin

Funding Source: General Fund

Time Frame: Ongoing

Related Policies: 1.12

Expected Results: Adopt Policy with 90 days of an application.

APPENDIX A

AFFORDABILITY GAP ANALYSIS

Summary of Per Unit Rent Affordability Gaps
City of Tustin
1992

Income Level Definition	Level I	Level II	Level III
	Less than 50% of Median Income Under \$26,350	51% to 80% of Median Income \$26,351 to \$42,160	81% to 120% of Median Income \$42,161 to \$63,240
Affordable Housing Cost Definition:			
Midpoint of Income Range	30% of 40% of Median Income, Adjusted for Family Size	30% of 60% of Median Income, Adjusted for Family Size	30% of 100% of Median Income, Adjusted for Family Size
Maximum of Income Range	30% of 50% of Median Income, Adjusted for Family Size	30% of 80% of Median Income, Adjusted for Family Size	30% of 120% of Median Income, Adjusted for Family Size
Affordability Gap:			
<u>Fourplex, Moderate Rehabilitation</u>	<u>Midpoint</u>	<u>Midpoint</u>	<u>Midpoint</u>
1 Bedroom	\$97,100	\$75,300	\$32,100
2 Bedroom	\$87,200	\$60,200	\$6,000
3 Bedroom	\$84,000	\$54,800	\$0
<u>Large Project Moderate Rehabilitation</u>			
1 Bedroom	\$77,100	\$55,300	\$12,100
2 Bedroom	\$67,200	\$40,200	\$0
<u>New Multi-Family Rental (Cosmopolitan Apts. Site)</u>			
2 Bedroom	<u>Midpoint</u> <u>Maximum</u>	<u>Midpoint</u> <u>Maximum</u>	<u>Midpoint</u> <u>Maximum</u>
3 Bedroom	\$92,000 \$78,500	\$65,000 \$37,900	\$10,800 \$0
4 Bedroom	\$103,800 \$89,200	\$74,600 \$45,400	\$16,100 \$0
	\$112,500 \$96,800	\$81,100 \$49,800	\$18,300 \$0

TUSTIN

GENERAL PLAN

Circulation Element

T U S T I N
GENERAL PLAN

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INTRODUCTION TO THE CIRCULATION ELEMENT

The Circulation Element is one of seven mandated elements of the General Plan and is intended to guide the development of the City's circulation system in a manner that is compatible with the Land Use Element. Because of the importance of a well-planned circulation system, the State of California has mandated the adoption of a Citywide Circulation Element since 1955. The anticipated level and pattern of development, as identified in the Land Use Element, will increase capacity demands on the City's roadways. To help meet these demands and achieve balanced growth, the City has adopted specific goals and policies which serve as the basis for the Circulation Element.

PURPOSE OF THE CIRCULATION ELEMENT

The purpose of the Circulation Element is to provide a safe, efficient and adequate circulation system for the City. To meet this purpose and the requirements of Government Code Section 65302 (b), the Circulation Element addresses the circulation improvements needed to provide adequate capacity for future land uses. Corresponding goals and policies have been adopted to ensure that all components of the circulation system will meet the needs of the City of Tustin. The Element establishes a hierarchy of transportation routes with specific development standards described for each category of roadway.

Insofar as they pertain to the community, the following subjects are included in the Circulation Element of the general plan:

- Streets and highways
- Transportation Corridors
- Transportation System Management and Transportation Demand Management
- Transit and rapid transit
- Railroads
- Paratransit (e.g., jitneys, carpooling, vanpooling and taxi service)
- Bicycle and pedestrian facilities
- Commercial, general and military airports

This Element is designed to comply with the directive of state law and guidelines in order to achieve the objectives of promoting the

efficient transport of goods and the safe, efficient movement of traffic within the City.

SCOPE AND CONTENT OF THE ELEMENT

The Circulation Element contains goals and policies designed to improve overall circulation in Tustin and to address circulation issues that concern the City. For highway transportation, the physical attributes involve a network of existing and future roadways defined according to designated roadway types, each with specific design standards. Other modes are defined by appropriate physical attributes (i.e., bicycle trails).

The General Plan Traffic Analysis technical report prepared by Austin-Foust Associates, Inc., and the Circulation Technical Memorandum published prior to preparation of the Circulation Element provide background information and act as supporting documents for the Circulation Element.

RELATED PLANS AND PROGRAMS

There are a number of transportation plans that affect circulation planning for the City of Tustin. Several transportation plans have been prepared by the County of Orange, focusing on the development of a regional transportation system to handle the anticipated traffic loads expected from future development. A number of plans have also been prepared identifying the location of future routes for mass transit including light rail and conventional buses. Plans and programs related to the Circulation Element include the following:

County of Orange Master Plan of Arterial Highways (MPAH) - The MPAH forms part of the Orange County General Plan and designates the arterial system in the circulation element of the general plan. Defined according to specific arterial functional classifications, the MPAH serves to define the intended future road system for the County. Cities within the County are expected to achieve consistency with the MPAH in their individual general plan circulation elements.

Eastern Transportation Corridor (ETC) - The ETC is one of the three transportation corridors being planned for Orange County. They will initially be constructed as toll facilities and then eventually revert to free facilities when the facility costs are paid off. The west leg of the ETC serves the City of Tustin and runs east of and parallel to

Jamboree Road from its intersection with the east leg in the City of Orange to Jamboree Road north of Edinger Avenue near the border between the City of Tustin and the City of Irvine.

South Coast Air Basin and Air Quality Management Plan - The South Coast Air Quality Management District (AQMD) is a regulatory body responsible for improving air quality in the South Coast Air Basin. Of primary importance to transportation is Regulation 15, which requires Transportation Demand Management (TDM) strategies and programs for companies with more than 100 employees. These TDM strategies and programs are aimed at increasing the average number of persons per vehicle arriving during the morning peak period. The Air Quality Management District (AQMD) has adopted the 1991 Air Quality Management Plan (AQMP), an advisory document which identifies a number of air pollution reduction goals, measures and policies. Local jurisdictions have been mandated to reduce a fair share proportion of vehicle pollution through the adoption of a menu of optional Transportation Control Measures (TCMs) which have been determined by the local agency to be politically and economically feasible. The AQMD is currently drafting a Backstop Measure to ensure that local agencies meet their fair share allocation.

The Orange County League of Cities has provided each Orange County city its fair share trip reduction goal. The City of Tustin has been recently recognized as having met 122% of its allocated vehicle trip reduction goal. Therefore, it is currently assumed that the City will not need to adopt any additional Transportation Control Measures to comply with the 1991 AQMP. In addition, the City closely monitors air quality matters with the intent of complying with future revisions of the AQMP. Therefore, the mitigation measures and policies identified within this document or other measures acceptable to the AQMD will be implemented by the City who will have the discretion to select those transportation control measures that are economically feasible and will achieve compliance with the 1991 AQMP.

County of Orange Congestion Management Plan - With the passage of the gas tax increase (Proposition 111) in June of 1990, it became a requirement that urbanized areas such as Orange County adopt a Congestion Management Program (CMP). The goals of the CMP are to reduce traffic congestion and to provide a mechanism for coordinating land use development and transportation improvement decisions. For the most part, the Orange County CMP is a composite of local agencies' submittals in which each local jurisdiction develops the required data in accordance with the guidelines established by the Orange County Transportation Authority (OCTA). The OCTA

compiles the data and submits the results to the Southern California Association of Governments (SCAG) for a finding of regional consistency.

County of Orange Growth Management Plan - On November, 1990 voters approved Measure M, the revised Traffic Improvement and Growth Management ordinance, which authorized the imposition of a one-half percent sales tax to fund needed transportation improvements. To be eligible to receive funds, local jurisdictions must satisfy a variety of requirements as set out in the Orange County Local Transportation Authority (LTA) Ordinance No. 2. Included in these requirements are the need to adopt a traffic circulation plan consistent with the MPAH, to adopt and adequately fund a local transportation fee program, to satisfy maintenance requirements, and to adopt a seven year capital improvement program that includes all transportation projects funded partially or fully by Measure M funds. The GMP requirements include certain provisions that are contained within the City's Growth Management Element.

County of Orange Master Plan of Scenic Highways - The County's General Plan includes a scenic highway element which designates certain highways as scenic routes. With this designation specific

guidelines are given for enhancing the scenic amenities of these facilities.

County of Orange Master Plan of Countywide Bikeways - Also part of the Countywide General Plan, the Master Plan of Countywide Bikeways designates various classes of bike routes throughout the county. One of the primary considerations is to provide continuity throughout the county and to provide a consistency between countywide and local jurisdiction bikeway plans.

Los Angeles/San Diego Corridor Commuter Rail Action Plan - This is one component of the overall rail plan for the Southern California area, and seeks to provide increased commuter train service along the Los Angeles/San Diego corridor with designated stops at various locations between the two cities. One of the commuter rail stations for this system may be located in the City of Tustin in the vicinity of Edinger Avenue near Jamboree Road.

RELATIONSHIP TO OTHER GENERAL PLAN ELEMENTS

The preparation of the Circulation Element is guided by and must conform with Section 65302(b) of the California Government Code.

A major goal in the update of the Tustin General Plan is to achieve internal consistency throughout the various General Plan elements. The Circulation Element relates to the other elements of the general plan in a variety of ways. For instance, the Circulation Element portrays the roadway system needed to serve traffic generated by the uses permitted in the Land Use Element. It is also associated with the Noise Element and air quality since traffic forecasts are used, in conjunction with other data, to determine noise contours and air quality impacts of the General Plan land uses.

The Circulation Element is also related to the Safety and Conservation/Open Space/Recreation Elements and Air Quality Subelement. The Safety Element addresses evacuation routes and minimum road widths to accommodate City residents in the event of a catastrophe, and the Conservation/Open Space/Recreation Element can identify standards for roadways, scenic highways and multi-use recreation trails.

Because of its transportation-related issues, the Growth Management Element has a relationship with the Circulation Element. In November 1990, Orange County voters approved Measure M which increases sales tax revenues to fund needed transportation improvements throughout the County. To qualify to receive a portion of these revenues, each jurisdiction within the County must adopt a Growth Management Element. The City of Tustin adopted its Growth Management Element in February 1992. The Growth Management Element contains a policy that establishes a minimum Level of Service (LOS) to be maintained at intersections impacted by new development. It also contains a policy to promote TDM measures in the City and a Phasing Program to ensure coordination between new development and roadway capacities. These issues are addressed in a consistent fashion between the Circulation and Growth Management Elements.

SUMMARY OF ISSUES, NEEDS, OPPORTUNITIES, AND CONSTRAINTS

This section summarizes circulation-related issues, needs, opportunities and constraints identified in the General Plan preparation process, and which are addressed within the goals and policies and the proposals contained in the physical description of the Circulation Element.

LOCAL THOROUGHFARES AND TRANSPORTATION ROUTES

- Through traffic impacts many residential neighborhoods in Tustin.
- A lack of adequate landscaping and buffering exists between many of Tustin's arterial roadways and freeway segments and adjacent land uses.
- Tustin's commercial corridor roadways contain a proliferation of driveways, inhibiting traffic flow.
- Some streets are presently operating beyond their design capacity.
- Standards need to be developed, such as level of service and performance criteria, to monitor the traffic-related impacts of land use decisions on the circulation system.
- Truck routes need to be clearly identified and should avoid residential streets.

INTERCITY AND REGIONAL TRANSPORTATION

- The City of Tustin has limited control over freeway improvements being undertaken by Caltrans.
- Tustin has limited control over substantial regional traffic which proceeds through its jurisdiction.
- The need for the Browning Avenue/I-5 Freeway overcrossing remains to be resolved.

- The completion of the western leg of the Eastern Transportation Corridor will have a significant effect on traffic circulation in Tustin.

TRANSPORTATION SYSTEM/DEMAND MANAGEMENT

- Traffic Demand Management (TDM) strategies are required under both current air quality legislation and requirements of Proposition 111 legislation (Congestion Management Program).
- A comprehensive transportation system/demand management program will serve to improve traffic congestion and reduce parking demand.

TRANSIT, BICYCLE, PEDESTRIAN, AND EQUESTRIAN FACILITIES

- In order to maximize use of public transit, new development should be designed to accommodate bus stops.
- Particularly with development of East Tustin, there is a need for "Park-N-Ride" facilities to enhance bus ridership for non-local trips.
- With portions of the Planning Area not currently served with bikeways (the southwest, west, east, and north), bicycles are forced to compete with automobiles along right-of-ways.
- Many of Tustin's sidewalks are not wheelchair accessible.
- The trail system within the City is incomplete and connections of local and regional trails are needed.

PARKING

- Certain areas of Tustin have inadequate off-street parking which in turn places a burden on public streets or other properties to correct this deficiency.
- Separate parking areas for small parcels are often inefficient, and result in a proliferation of driveways along arterials. Shared parking provisions should be considered.

- On-street parking along key City arterials inhibits efficient traffic flow and optimization of roadways for carrying traffic.

ALTERNATIVE FINANCING

- Alternative financing mechanisms need to be explored for implementation of circulation system management and maintenance.

CIRCULATION ELEMENT GOALS AND POLICIES

The following goals and policies form the basis for providing a circulation system which adequately serves the development intensity anticipated in the Land Use Element. They are designed to reflect and support the Citywide goals of the General Plan, and acknowledge the changing economic and environmental conditions in the City and surrounding regions.

LOCAL THOROUGHFARES AND TRANSPORTATION ROUTES

A well-planned street system provides safe and convenient access to land use development in the City and serves the primary mobility needs of the community. To provide such a system, the Circulation Element includes a planned hierarchy of arterial roadways, each roadway serving a specific function and carrying a portion of the anticipated traffic demands.

GOAL 1: Provide a system of streets that meets the needs of current and future inhabitants and facilitates the safe and efficient movement of people and goods throughout the City consistent with the City's ability to finance and maintain such a system.

Policy 1.1: Develop and maintain a circulation system that is based upon and is in balance with the Land Use Element of the General Plan.

Policy 1.2: Develop and implement circulation system standards for roadway and intersection classifications, right-of-way width, pavement width, design speed, warrant requirements, capacity, maximum grades and associated features such as medians and bicycle lanes or trails that are adjacent or off-road.

Policy 1.3: Coordinate roadway improvements with applicable regional, state and federal transportation plans and proposals.

Policy 1.4: Develop and implement thresholds and performance standards for acceptable levels of service.

Policy 1.5: Develop a program to identify, monitor and make recommendations for improvements to roadways and intersections

that are approaching, or have approached, unacceptable levels of service or experiencing higher than expected accident rates.

Policy 1.6: Develop and improve the City's transportation network consistent with available funding; scheduling shall be coordinated with land use plans to ensure the orderly extension of facilities and to preserve a free-flowing circulation system.

Policy 1.7: Provide for and work with responsible agencies regarding the safe and expeditious transport of hazardous materials.

Policy 1.8: Limit driveway access on arterial streets to maintain a desired quality of flow.

Policy 1.9: Design local and collector streets to discourage their use as alternate through routes to secondary, primary, and major streets.

Policy 1.10: Require that proposals for major new developments include a future traffic impact analysis which identifies measures to mitigate any identified project impacts.

Policy 1.11: Encourage new development which facilitates transit services, provides for non-vehicular circulation and minimizes vehicle miles traveled.

Policy 1.12: Minimize pedestrian and vehicular conflicts through street design and well-marked pedestrian crossings.

Policy 1.13: Minimize effects of transportation noise wherever possible so as to comply with the Noise Element.

Policy 1.14: Enhance the important role that streetscapes play in defining the character of the City by expanding street planning and design procedure to include aesthetic and environmental concerns, as well as traffic considerations. Develop a circulation system which highlights environmental amenities and scenic areas.

Policy 1.15: Ensure construction of existing roadways to planned widths, as new developments are constructed.

Policy 1.16: Continue to require dedication of right-of-way and construction of required public improvements on streets adjacent to construction projects at the developer's expense.

Policy 1.17: Direct existing through traffic from local streets to collector, secondary, and arterials to reduce traffic on local streets, improve neighborhood safety and environmental quality.

Policy 1.18: Assist and develop safe school routes in conjunction with the Tustin Unified School District.

GOAL 2: Provide for a truck circulation system that provides for the effective transport of commodities while minimizing the negative impacts throughout the City.

Policy 2.1: Provide primary truck routes and describe such routes on selected arterial streets to minimize the impacts of truck traffic on residential areas.

Policy 2.2: Provide appropriately designed and maintained roadways for the primary truck routes.

Policy 2.3: Provide loading areas and accessways that are designed and located so as to avoid conflicts with efficient traffic circulation.

Policy 2.4: Consider safety regulations addressing trucks hauling materials within the City.

Policy 2.5: Discourage on-street loading and unloading of commercial and industrial products.

INTERCITY AND REGIONAL TRANSPORTATION

The Circulation Element is set in a regional context which recognizes the related transportation needs and planning activities of the surrounding County, Region, and State.

GOAL 3: Support development of a network of regional transportation facilities which ensure the safe and efficient movement of people and goods from within the City to areas outside its boundaries, and which accommodate the regional travel demands of developing areas outside the City.

Policy 3.1: Support the completion of the Orange County Master Plan of Arterial Highways.

Policy 3.2: Support capacity and noise mitigation improvements such as high-occupancy vehicle lanes, general purpose lanes, auxiliary lanes and noise barriers on the I-5 and SR-55 freeways.

Policy 3.3: Monitor and coordinate with Caltrans freeway work as it

affects Tustin's roadway and require modifications as necessary.

Policy 3.4: Maintain a proactive and assertive role with appropriate agencies dealing with regional transportation issues affecting the City.

Policy 3.5: Work with adjacent cities to ensure that the traffic impacts of development projects in these cities do not adversely impact the City of Tustin.

Policy 3.6: Support the presence of John Wayne Airport consistent with it maintaining safe operation, avoiding noise impacts and ensuring compatibility with land uses in Tustin.

Policy 3.7: Monitor monorail design study process to ensure opportunities for future linkages in Tustin are examined and mass transit alternatives are explored.

Policy 3.8: Monitor Commuter Rail Action Plan implementation and rail stop locations for potential opportunities in Tustin, and pursue potential opportunities for a rail stop location in Tustin. Seek alternative funding sources to finance a stop, if feasible, in Tustin.

Policy 3.9: Work with the Southern California Regional Rail Authority, the Orange County Transportation Authority (OCTA and AT & SF) to reduce or eliminate current traffic interruptions due to rail crossings along arterials.

TRANSPORTATION SYSTEM/DEMAND MANAGEMENT

Effective Circulation planning includes the application of Transportation System Management (TSM) and Transportation Demand Management (TDM) strategies. Together, these improve the efficiency of the transportation system and reduce vehicular demands, thereby reducing the impacts of future development.

GOAL 4: Maximize the efficiency of the circulation system through the use of transportation system management and demand management strategies.

Policy 4.1: Implement traffic signal coordination on arterial streets to the maximum extent practical, consistent with financial resources, integrate signal coordination efforts with those of adjacent jurisdictions, and implement other operational measures where possible to maximize the efficiency of the existing circulation system and to minimize delay and congestion.

Policy 4.2: Implement intersection capacity improvements where feasible.

Policy 4.3: Encourage the implementation of employer Transportation Demand Management (TDM) requirements included in the Southern California Air Quality Management District's Regulation 15 of the Air Quality Management Plan and as required by Proposition 111 as part of the Congestion Management Program (CMP) and participate in regional efforts to implement TDM requirements.

Policy 4.4: Require that proposals for major new non-residential developments include submission of a TDM plan to the City, including monitoring and enforcement provisions.

Policy 4.5: Encourage the development of additional regional public transportation services and support facilities including park-and-ride lots near the SR-55 and I-5 freeways.

Policy 4.6: Encourage the promotion of ridesharing through publicity and provision of information to the public.

GOAL 5: Support development of a public transportation system that provides mobility to all City inhabitants and encourages use of public transportation as an alternative to automobile travel.

Policy 5.1: Support the efforts of the appropriate transportation agencies to provide additional local and express bus service to the Tustin community, and to provide park-and-ride lots near the SR-55 and I-5 freeways.

Policy 5.2: Require new development to fund transit facilities, such as bus shelters and turn-outs, where deemed necessary to meet public needs arising in conjunction with development.

Policy 5.3: Ensure accessibility of public transportation for elderly and disabled persons, consistent with City responsibilities for accessibility.

Policy 5.4: Encourage employers to reduce vehicular trips by offering employee incentives, such as subsidized bus passes and vanpool/carpool programs.

Policy 5.5: Promote new development that is designed in a manner which facilitates provision or expansion of transit service, and provides non-automobile circulation within the development.

Policy 5.6: Encourage developers to work with agencies providing transit service with the objective of maximizing the potential for transit use by residents and/or employees.

Policy 5.7: Promote the provision of safe transit stops and shelters.

TRANSIT, BICYCLE, PEDESTRIAN AND EQUESTRIAN FACILITIES

Non-vehicular modes of travel serve certain mobility needs and also provide recreational opportunities. Where possible, the Element provides for these modes of travel by separate trails, walkways and bike lanes.

GOAL 6: Increase the use of non-motorized modes of transportation.

Policy 6.1: Promote the safety of pedestrians and bicyclists by adhering to uniform standards and practices, including designation of bicycle lanes, off-road bicycle trails, proper signage, and adequate sidewalk, bicycle lane, and off-road bicycle trail widths.

Policy 6.2: Maintain existing pedestrian facilities and require new development to provide pedestrian walkways between developments, schools and public facilities.

Policy 6.3: Ensure accessibility of pedestrian facilities to the elderly and disabled.

Policy 6.4: Support and coordinate the development and maintenance of bikeways in conjunction with the County of Orange Master Plan of Countywide Bikeways to assure that local bicycle routes will be compatible with routes of neighboring jurisdictions.

Policy 6.5: Require the provision of showers and an accessible and secure area for bicycle storage on certain size non-residential developments as required by the City's TDM ordinance.

Policy 6.6: Develop programs that encourage the safe utilization of easements and/or rights-of-way along flood control channels, public utility rights-of-way, and street rights-of-way wherever possible for the use of bicycles and/or pedestrian/equestrian trails.

Policy 6.7: Ensure link-up of trails within the City to the regional trail system.

Policy 6.8: Support retrofit installation of sidewalks in industrial districts and Planned Community Business Parks as development occurs.

Policy 6.9: Support and coordinate the development and maintenance of bikeways and trails in conjunction with the master plans of the appropriate agencies.

Policy 6.10: Encourage safe biking by supporting safety clinics/courses sponsored by various local and state agencies.

Policy 6.11: Consider the provision of unique transportation methods, such as shuttle buses from outlying parking areas, for special events.

Policy 6.12: Provide for a non-vehicular circulation system that encourages bicycle transportation and pedestrian circulation.

Policy 6.13: Maintain a City of Tustin Bikeway Plan (that complements and is coordinated with the County's Plan as well as neighborhood jurisdictions) which will identify existing and future routes within the City to accommodate such uses.

Policy 6.14: Require new development to dedicate land and fund improvement of bicycle, pedestrian and equestrian facilities, where deemed necessary to meet public needs arising in conjunction with development.

PARKING

Adequate and convenient parking facilities are an important part of the transportation amenities provided by a City. The Circulation Element therefore contains policies which ensure the provision of such amenities.

GOAL 7: Provide for well-designed and convenient parking facilities.

Policy 7.1: Consolidate parking, where appropriate, to eliminate the number of ingress and egress points onto arterials.

Policy 7.2: Provide sufficient off-street parking for all land uses.

Policy 7.3: Encourage the efficient use of parking facilities, including provisions for shared use of facilities, smaller vehicles and other provisions to improve the effectiveness of City codes and ordinances.

Policy 7.4: Reduce use of arterial streets for on-street parking in an effort to maximize traffic flow characteristics of roadways.

ALTERNATIVE FINANCING

Implementation of the Circulation Element requires an adequate source of funding for the improvements that will be required. The goal and policies which follow emphasize the importance of this aspect of the Element.

GOAL 8: Define and evaluate alternative financing methods for circulation system management and maintenance costs on a Citywide and areawide basis.

Policy 8.1: Develop a transportation improvement fee program which will enable circulation improvements to be funded by new development.

Policy 8.2: Prepare a phasing plan for cumulative circulation improvements that identifies project specific responsibilities and requires fair share funding.

Policy 8.3: Maintain County standards set to qualify for new revenue sources provided by the passage of Measure M and Proposition 111.

RELATED GOALS AND POLICIES

The goals and policies described in the Circulation Element are related to and support subjects included within other General Plan elements. In turn, many goals and policies from the other elements directly or indirectly support the goals and policies of the Circulation Element. These supporting goals and policies are identified in Table C-1.

**TABLE C-1
CIRCULATION RELATED GOALS AND POLICIES BY ELEMENT**

Circulation Issue Area	RELATED GOALS AND POLICIES BY ELEMENT						
	Circulation	Housing	Land Use	Conservation/ Open Space	Public Safety	Noise	Growth Management
Local Thoroughfares and Transportation Routes			3.1, 4.1, 6.3, 7.5, 8.4, 8.7	1.2	4.3, 4.7	1.11	1.2, 1.3
Intercity and Regional Transportation			11.1	2.4, 2.5, 2.10, 2.13	3.8, 4.2	1.12	
Transportation System/Demand Management				2.1, 2.2, 2.3			1.4
Bicycle, Pedestrian and Equestrian Facilities		6.1	6.1, 10.3, 11.3	1.4, 1.5, 1.7, 2.6, 8.14, 14.3			
Parking			3.8	2.8			
Financing							2.1, 2.2, 2.3, 2.4, 2.9

CIRCULATION PLAN

This section of the Circulation Element defines a circulation plan for the City that meets the requirements for safe and convenient movement of persons and goods at the development intensity anticipated in the Land Use Element. It includes a classification system that applies to all roadways that serve the City, and identifies specific improvements that will be required to implement this plan. A bikeway plan is delineated, and other components of the element such as public transit are discussed.

ROADWAY FACILITY CLASSIFICATIONS

The arterial highway system in Tustin is defined using a classification system which describes a hierarchy of facility types. The categories of roadways included in this classification system differentiate the size, function and capacity of the roadway links for each type of roadway. There are four basic categories in the hierarchy, ranging from "major" with the highest capacity to "local" streets with the lowest capacity, and these can be summarized as follows:

Major: A six-lane divided roadway with no on-street parking, with a typical right-of-way width of 120 feet and a curb-to-curb pavement width of 102 feet. Major arterials typically carry a significant volume of regional traffic. When the traffic volumes warrant a major arterial highway in areas where a full 120 feet of right-of-way is not feasible due to existing structures or topography, a lesser right-of-way (e.g., 100 feet) can be used to accommodate a six-lane facility. This is referred to as a "modified major" on the County Master Plan of Arterial Highways (MPAH) and on the City Arterial Highway Plan.

Primary: A four-lane divided roadway, with a typical right-of-way width of 100 feet and curb-to-curb pavement width of 84 feet. Regional traffic will typically be less than for a major arterial, but primary arterials form an important component of the regional transportation system. When the traffic volumes warrant a primary arterial highway in areas where a full 100 feet of right-of-way is not feasible due to existing structures or topography, a lesser right-of-way (e.g., 80 feet) can be used to accommodate a four-lane facility. This is referred to as a "modified primary" on the County Master Plan of Arterial Highways and on the City Arterial Highway Plan.

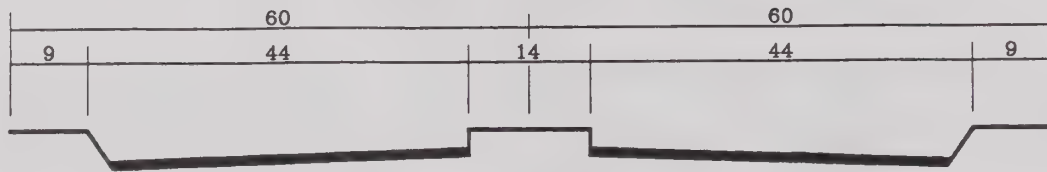
Secondary: A four-lane undivided roadway, with a typical right-of-way width of 80 feet and a curb-to-curb pavement width of 64 feet. These roadways serve as collectors, distributing traffic between local streets, and major and primary arterials.

Local: A two-lane undivided roadway with a typical right-of-way width of 60 feet and a pavement width of 36 to 40 feet. This category of roadway is designed to provide access to individual parcels in the City. It is generally not included in the Circulation Element unless special circumstances require such inclusion for purposes of system continuity.

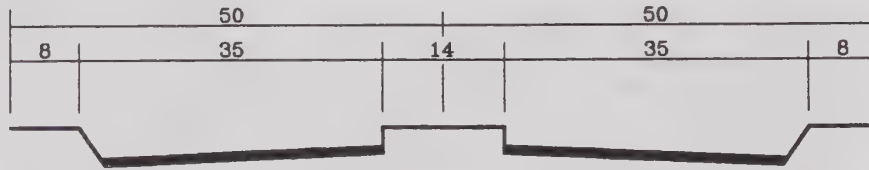
The Circulation Element roadway classification system does not include private streets. Private street widths and cross-sections will vary from those described for roadways in this Element. Standard cross-sections represent the obvious and accepted answer to most situations. However, the standard cross-sections do not always provide the best solution to any given need or set of objectives. Reasonable flexibility and variety is provided for in the City's private street standards.

Figure C-1 shows schematic cross sections of each category of arterial roadway. These sections represent desirable standards, but variation in right-of-way width and specific road improvements will occur in certain cases due to physical constraints and/or right-of-way limitations. In particular, the median width in six-lane and four-lane roadways will vary according to the area being served and the available right-of-way constraints and turn lane requirements. Hence, any of the arterial classifications may deviate from the standards where physical constraints exist or where preservation of community character dictates special treatment. Bikeway facilities are another factor which affect the specific standards applied for various facilities.

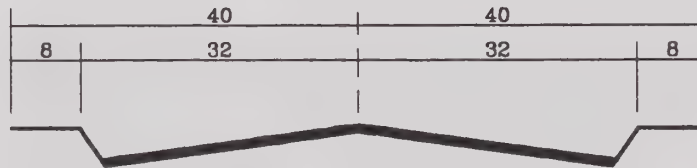
The desirable goal for every classified street section is that it carry the designed volume of traffic at the desired level of service. Within this requirement, descriptions of width and facilities are offered as basic guidelines and as noted above, variation in design is expected, depending on different community design characteristics. Different optional facilities are also expected (on-street parking, sidewalks versus pathways, bicycle lanes or paths, extra parkway or median landscape treatment, etc.). Another design consideration is the need to provide for the capacity requirements as specified in the County Master Plan of Arterial Highways. Specific design requirements for construction are available for public streets from the Public Works Department.



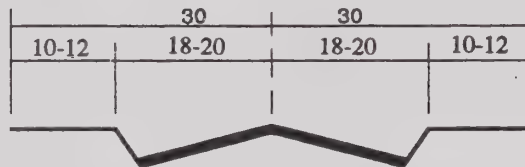
Major Arterial 120' R/W



Primary Arterial 100' R/W



Secondary Arterial 80' R/W



Local Street 60' R/W

To accommodate the estimated future traffic on the arterial highway system, two qualifiers are included into the highway component of the Circulation Element:

Modified Right-of-way

This qualifier is used in the County Master Plan of Arterial Highways and in the City's current Arterial Highway Plan. It allows for achieving the same or similar traffic-carrying capacity of basic roadway classifications and typical sections identified for each classification type, but within a reduced right-of-way. Typical changes to the basic section may include reductions in median width and sidewalk/pathway width, reduced lane standards and elimination of parking and bike lanes.

Augmented Capacity

The traditional approach to providing additional capacity on an arterial system is to upgrade individual arterials to a higher facility type or to add lanes. Typical examples would be upgrading a four-lane primary to a six-lane major and upgrading a six-lane major to an eight-lane major. The implication is that additional capacity should be provided by additional thru lanes along the length of the arterial. The augmented capacity concept focuses on sections of arterial where the link capacity is deficient and provides additional capacity by a variety of means ranging from traffic operations measures to actual roadway widening. Typical measures include:

- Addition of through or turn lanes
- Preferential traffic signal timing and synchronization
- Auxiliary lanes
- Removal of on-street parking
- Intersection grade separations
- Grade separated turning movements
- Access consolidation
- Access limitation: right-turns only, or no access (streets and/or driveways)
- Pedestrian grade separations
- Bus turnouts
- Other traffic engineering or traffic management strategies which provide enhanced capacity

The intent of these measures is to minimize conflicts with cross-traffic, to improve traffic-carrying capacity, and to facilitate improved traffic flow along arterials. The augmented capacity concept is therefore

intended to represent a strategy that can be utilized on all or a portion of a section of roadway to enhance traffic-carrying capacity.

Common applications of augmented capacity include auxiliary lanes which allow for right-turn movements into and out of driveways or side streets, and additional lanes at intersections. An example of auxiliary lane deployment is on a section of arterial adjacent to a freeway interchange. A significant increase in capacity can be gained by providing auxiliary lanes on the arterial which serve as dedicated lanes for the on and off-ramps. An example of an auxiliary lane can be seen on the section of Jamboree Road north of I-5 where Jamboree Road has three lanes plus an auxiliary lane in the southbound direction. Intersection widening is another form of capacity augmentation, and may include additional turn lanes as a means of increasing capacity, and additional thru lanes may be added if necessary. Also, as noted above, any traffic engineering or traffic management strategy which enhances capacity, can be considered as contributing to the augmented capacity.

Use of this qualifier recognizes that in augmenting capacity from a basic arterial capacity, individual locations have different traffic characteristics and therefore, need to be addressed individually. Actual improvements will be determined from special design studies, and by using the augmented capacity designation, the General Plan has a means of showing where such improvements might be needed in the future.

PERFORMANCE CRITERIA

Evaluating the ability of the circulation system to serve the desired future land uses requires establishing suitable "performance criteria". These are the means by which future traffic volumes are compared to future circulation system capacity, and the adequacy of that circulation system assessed.

Performance criteria have a policy component which establishes a desired level of service (LOS) and a technical component which specifies how traffic forecast data can be used to measure the achievement of the criteria. The performance criteria used for evaluating volumes and capacities on the City street system are summarized in Table C-2 and include both average daily traffic (ADT) link volume and peak hour intersection volume criteria.

Table C-2
CIRCULATION SYSTEM PERFORMANCE CRITERIA

The following are the performance criteria used for comparing volumes and capacities on the city street and highway system:

I. AVERAGE DAILY TRAFFIC (ADT) LINK VOLUMES

Level of Service D - All roadways, except designated CMP highways

Level of Service E - CMP highways

Table A below shows ADT volumes corresponding to these levels of service.

II. PEAK HOUR INTERSECTION VOLUMES

Level of Service D - Threshold level of service.

Level of Service E - CMP highway intersections.

Table B below shows how these levels of service are specified.

Table A
ADT LEVEL OF SERVICE VOLUMES BY FACILITY TYPE

FACILITY TYPE	MAXIMUM VOLUMES				
	LOS A	LOS B	LOS C	LOS D	LOS E
Major (6 lane divided)	33,900	39,400	45,000	50,600	56,300
Augmented Major	40,500	47,300	54,000	60,800	67,600
Primary (4 lane divided)	22,500	26,200	30,000	33,700	37,500
Augmented Primary	27,000	31,500	36,000	40,500	45,000
Secondary (4 lane undivided)	15,000	17,500	20,000	22,500	25,000
Augmented Secondary	18,000	21,000	24,000	27,000	30,000

Table B
PEAK HOUR LEVEL OF SERVICE

Peak hour intersection Level of Service (LOS) to be based on Intersection Capacity Utilization (ICU) values calculated as follows:

Saturation flow rate
Clearance interval

1700 Vehicles Per Hour (VPH)
None

Levels of Service are as follows:

LEVEL OF SERVICE	MAXIMUM ICU VALUE
LOS A	.60
LOS B	.70
LOS C	.80
LOS D	.90
LOS E	1.00
LOS F	Above 1.00

The City of Tustin has established level of service LOS "D" as a threshold standard to monitor capacity needs for both ADT link volumes and peak hour volumes. Because of the significant amount of regional traffic on the designated Smart Streets (Irvine Boulevard, Edinger Avenue, and Jamboree Road south of Irvine Boulevard) level of service "E" is the recommended standard for these facilities, consistent with CMP guidelines.

Table C-3 describes traffic flow quality for different levels of service. Such criteria would be applied consistently for evaluating land use and circulation system changes and are the basis for the General Plan circulation recommendations contained in this report.

RELATIONSHIP TO LAND USE

Future traffic volumes and highway capacity needs are directly related to future land use. Table C-4 compares existing and buildout land use and the corresponding trip generation. Existing daily trip generation for the entire City is around 479,400 vehicle trips per day. Approximately 32 percent of this is attributed to residential uses, with the remaining 68 percent generated by non-residential uses. For buildout of the proposed General Plan land uses, the comparative total ADT trip generation is approximately 766,000 average daily trips, an increase of 63 percent.

The Arterial Highway Plan presented in the next section is designed to carry the added trips that will occur with buildout of the City's General Plan land uses and with the buildout of the general plans of the surrounding cities and the county. Traffic increases from the latter involve significant amounts of through traffic on certain facilities, such as Irvine Boulevard and Redhill Avenue.

GENERAL PLAN CIRCULATION SYSTEM

The goals and policies included in this Element emphasize the need for a circulation system that is capable of serving both existing and future residents while preserving community values and character. The location, design and constituent modes of the circulation system have major impacts on air quality, noise, community appearance, and other elements of the environment.

Table C-3
PEAK HOUR LEVEL OF SERVICE DESCRIPTIONS

LEVEL OF SERVICE	TRAFFIC FLOW QUALITY	V/C VALUE
I. VOLUME/CAPACITY RELATIONSHIPS¹		
A	Low volumes; high speeds; speed not restricted by other vehicles; all signal cycles clear with no vehicles waiting through more than one signal cycle.	0.00 - 0.60
B	Operating speeds beginning to be affected by other traffic; between one and 10 percent of the signal cycles have one or more vehicles which wait through more than one signal cycle during peak traffic periods.	0.61 - 0.70
C	Operating speeds and maneuverability closely controlled by other traffic; between 11 and 30 percent of the signal cycles have one or more vehicles which wait through more than one signal cycle during peak traffic periods; recommended ideal design standards.	0.71 - 0.80
D	Tolerable operating speeds; 31 to 70 percent of the signal cycle have one or more vehicles which wait through more than one signal cycle during peak traffic periods; often used as design standard in urban areas.	0.81 - 0.90
E	Capacity; the maximum traffic volume an intersection can accommodate; restricted speeds; 71 to 100 percent of the signal cycles have one or more vehicles which wait through more than one signal cycle during peak traffic periods.	0.91 - 1.00
F	Long queues of traffic; unstable flow; stoppages of long duration; traffic volume and traffic speed can drop to zero; traffic volume will be less than the volume which occurs at Level of Service "E."	Above 1.00
II. INTERSECTION DELAY RELATIONSHIPS²		
A	Low delay (less than 5.0 seconds per vehicle). Occurs when progression is extremely favorable, and most vehicles arrive during the green phase and do not stop at all.	
B	Delay in the range of 5 to 15 seconds per vehicle. Generally occurs with good progression and/or short cycle lengths.	
C	Delay in the range of 15 to 25 seconds per vehicle. These higher delays may result from fair progression and/or longer cycle lengths. The number of vehicles stopping is significant at this level, although many still pass through the intersection without stopping.	
D	Delay in the range of 25 to 40 seconds per vehicle, and the influence of congestion becomes more noticeable. Longer delays may result from some combinations of unfavorable progression, long cycle lengths, or high V/C ratios. Many vehicles stop, and the proportion of vehicles not stopping declines. Individual cycle failures are noticeable.	
E	Delay in the range of 40 to 60 seconds per vehicle. This is considered to be the limit of acceptable delay. These high delay values generally indicate poor progression, long cycle lengths, and high V/C ratios. Individual cycle failures are frequent occurrences.	
F	Delay in excess of 60 seconds per vehicle. This is considered to be unacceptable to most drivers. This condition often occurs with oversaturation, i.e., when arrival flow rates exceed the capacity of the intersection. Poor progression and long cycle lengths may also be major contributing causes to such delay levels.	

Source: (1) Highway Capacity Manual, Highway Research Board Special Report 87, National Academy of Sciences, 1965.
(2) Highway Capacity Manual, Transportation Research Board Special Report 209, National Research Council, 1985.

Table C-4

LAND USE AND TRIP GENERATION SUMMARY

	Land Use Category	Units	— 1990 —		— Future —	
			Amount	ADT	Amount	ADT
1. CITY OF TUSTIN	1. Residential	DU	18,507	154,520	27,618	229,362
	2. Commercial/Office/Ind.	TSF	11,982	282,150	17,603	485,324
	3. Other	—	(3,943)	42,751	(5,720)	51,587
	Sub-Total			479,421		766,273
2. SPHERE OF INFLUENCE	1. Residential	DU	7,916	99,197	8,273	101,769
	2. Commercial/Office/Ind.	TSF	174	3,735	244	5,222
	3. Other	—	(2,329)	17,413	(2,515)	17,413
	Sub-Total			120,345		124,404
TOTAL	1. Residential	DU	26,423	253,717	35,891	331,131
	2. Commercial/Office/Ind.	TSF	12,156	285,885	19,405	490,546
	3. Other	—	(6,272)	60,164	(8,235)	69,000
	Sub-Total			599,766		890,677

Note: DU = Dwelling Units, TSF = Thousand Square Feet, ADT = Average Daily Traffic

The "Other" land use category refers to schools, churches, hospitals, hotels, parks, etc., which do not have a square foot based trip rate (see trip rates in Appendix A). The square footage equivalents are shown in parenthesis to provide consistency with the data given in the Land Use Element.

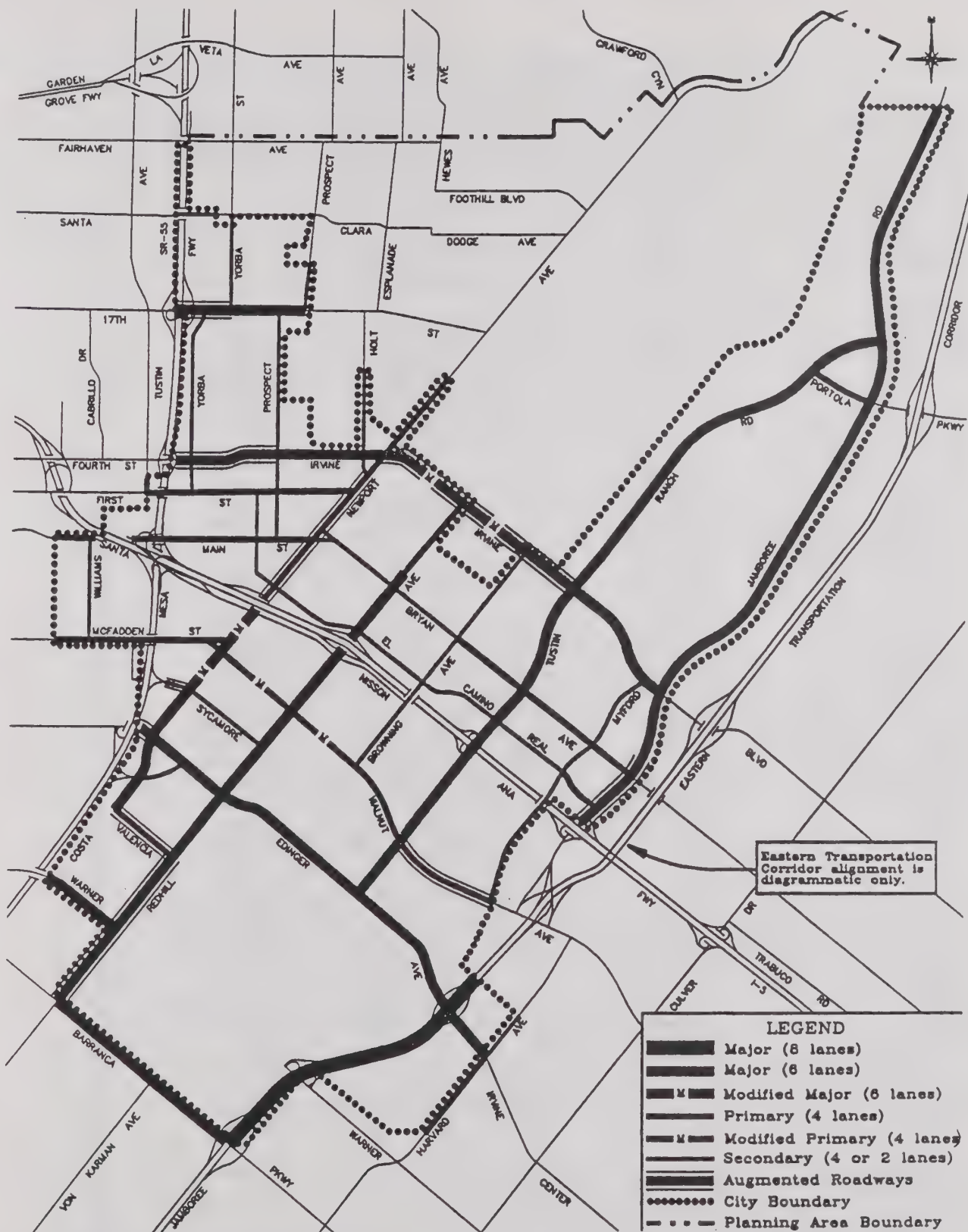
The highway network designated in the Arterial Highway Plan is illustrated in Figure C-2, and indicates all of the designated Major arterials, Primary arterials, Secondary arterials, and the sections of roadway designated for modified right-of-way or augmented capacity. Table C-5 provides an additional description of the Arterial Highway Plan links. Discussions on sections of roadway for which these two qualifiers are proposed as follows:

Modified Right-of-Way

As noted earlier in this chapter under the description of individual roadway classifications, major and primary arterial designations may not always imply the full right-of-way requirements as indicated in the standard cross-sections. Locations where such modified cross-sections are designated are as follows:

- Irvine Boulevard, Newport Avenue to Browning Avenue:

Classification: Modified Major (six-lane major arterial with modified cross-section)



- Notes: 1. Nisson Road is not shown on the Circulation Element. It is shown here for access to I-5 ramps.
2. Designations of roadways outside the city limits are not given here.

TUSTIN
GENERAL PLAN

Figure C-2
Arterial Highway Plan

**TABLE C-5
ARTERIAL HIGHWAY PLAN**

Link	Classification	Link	Classification
Williams n/o McFadden	Secondary	Santa Clara w/o Yorba	Secondary
Yorba s/o Santa Clara	Secondary	17th w/o Yorba	Major (A)
Yorba n/o Irvine	Secondary	17th w/o Yorba	Major
Yorba s/o Irvine	Secondary		
Prospect s/o Santa Clara	Secondary	Portola w/o Jamboree	Primary
Prospect s/o 17th	Secondary	Irvine w/o Prospect	Major(A)
Prospect s/o Irvine	Secondary	Irvine w/o Holt	Major
		Irvine w/o Newport	Major
Holt s/o 17th	Secondary	Irvine w/o Redhill	Major(M,A)
		Irvine w/o Browning	Major(M,A)
Newport s/o 17th	Primary	Irvine w/o Tustin Ranch	Major(A)
Newport s/o Holt	Primary(A)	Irvine e/o Tustin Ranch	Major
Newport s/o First	Primary(A)	Irvine e/o Myford	Major
Newport n/o El Camino	Primary(A)		
Newport s/o El Camino	Primary(A)	First w/o Yorba	Primary
Newport s/o Mitchell	Major(M)	First w/o El Camino Real	Primary
Newport s/o Walnut	Major(M)	First w/o Newport	Primary
Newport s/o Sycamore	Major		
Newport s/o Edinger	Major	Main w/o El Camino Real	Primary
Newport s/o Del Amo	Major	Main w/o Newport	Primary
Redhill s/o Irvine	Primary	Bryan w/o Redhill	Secondary
Redhill n/o El Camino	Major	Bryan w/o Browning	Secondary
Redhill s/o Nisson	Major	Bryan w/o Tustin	Primary
Redhill s/o Walnut	Major	Bryan w/o Jamboree	Primary
Redhill s/o Sycamore	Major		
Redhill s/o Edinger	Major	El Camino s/o First	Secondary
Redhill s/o Valencia	Major(A)	El Camino s/o Main	Secondary
Redhill n/o Barranca	Major(A)	El Camino w/o Redhill	Secondary
		El Camino w/o Browning	Secondary
Browning s/o Irvine	Secondary	El Camino w/o Tustin Ranch	Secondary
Browning s/o Bryan	Secondary	El Camino w/o Jamboree	Primary
Browning s/o Nisson	Secondary		
		McFadden w/o Williams	Primary
Tustin Ranch s/o Jamboree	Major	McFadden w/o SR-55	Primary
Tustin Ranch n/o La Colina	Major	McFadden w/o Newport	Primary
Tustin Ranch s/o La Colina	Major		
Tustin Ranch s/o Irvine	Major	Walnut w/o Redhill	Primary(M)
Tustin Ranch s/o Bryan	Major	Walnut w/o Browning	Primary(M)
Tustin Ranch s/o El Camino	Major	Walnut w/o Tustin Ranch	Primary
Tustin Ranch s/o I-5	Major	Walnut w/o Jamboree	Primary(A)
Tustin Ranch s/o Walnut	Major		
		Sycamore w/o Newport	Secondary(A)
Myford s/o Irvine	Secondary	Sycamore w/o Redhill	Secondary
Myford s/o Bryan	Secondary		
Myford s/o El Camino	Secondary	Edinger w/o Del Amo	Major(A)
Myford n/o Walnut	Secondary	Edinger w/o Redhill	Major
		Edinger w/o Tustin Ranch	Major
Jamboree n/o Tustin Ranch	Major	Edinger w/o Jamboree	Major
Jamboree s/o Tustin Ranch	Major	Edinger w/o Harvard	Major
Jamboree n/o Irvine	Major		
Jamboree s/o Irvine	Major	Valencia w/o Redhill	Primary(A)
Jamboree n/o El Camino	Major(A)		
Jamboree s/o El Camino	Major(A)	Warner w/o Redhill	Major
Jamboree s/o I-5	Major		
Jamboree s/o Edinger	Major		
Jamboree n/o Barranca	Major		

Notes: (A) denotes augmented facility; (M) denotes modified section.

- **Newport Avenue, I-5 to Sycamore Avenue:**

Classification: Modified Major (six-lane major arterial with modified cross-section)

- **Walnut Avenue, McFadden Street to east of Browning Avenue:**

Classification: Modified Primary (four-lane primary arterial with modified cross-section)

In each case it has been assumed that the modified cross-section will not affect the ADT capacity (e.g., a modified major will have the same capacity as a major).

Augmented Capacity

As noted in the earlier discussion on this concept, the actual improvements for capacity augmentation will be determined during special design studies. The following are the roadway sections for which the augmented qualifier is proposed:

Irvine Boulevard: This is a designated "Smart Street" on the County MPAH (previously referred to as "superstreet"). As such, capacity enhancements could range from maximization of intersection capacity under a basic six-lane facility, to a wider facility with potential grade separation at major intersections. As part of the countywide smart street program, the county will undertake the requisite design studies to identify future improvements along this facility. The two sections noted here as needing augmented capacity are from SR-55 to Prospect Avenue, and Newport Avenue to Tustin Ranch Road.

Redhill Avenue: Traffic forecasts for the sections of this facility south of Valencia Avenue exceed the capacity of a six-lane Major Arterial. The Circulation Element includes the southward extension of Newport Avenue to Valencia Avenue as a six-lane major arterial and Valencia Avenue is designated as a four-lane roadway from that connection point to Redhill Avenue. At the point where Valencia Avenue meets Redhill Avenue, there is essentially a convergence of a four-lane and a six-lane facility. The combined volumes indicate a need for augmentation of Redhill south of Valencia, possibly in the form of auxiliary lanes.

The Cities of Tustin and Irvine have negotiated an agreement concerning the mitigation of traffic impacts resulting from the City of Irvine's decision to increase the allowable intensity of development within the Irvine Business Complex (IBC). Under the agreement, a Project Design Report will be prepared which recommends

improvements necessary to City of Tustin standards for mitigation of traffic on Red Hill Avenue between Barranca Parkway, Dyer Road, and the I-5 freeway. Each City will pay its fair share of the cost of the necessary traffic improvements in accordance with the agreement.

Any future closure of the MCAS, Tustin may provide opportunities for other means of capacity increases in this area (e.g., an extension of Valencia into the Base and then south to Von Karman). Roadway assumptions will be determined at the time roadway analysis is prepared.

Newport Avenue: On the section of Newport Avenue north of I-5, future traffic volumes will exceed the ADT capacity of the current four-lane primary designation. Augmentation is recommended in the form of auxiliary lanes and additional turn lanes at intersections.

Seventeenth Street, SR-55 to Yorba Street (north): This section of roadway near the SR-55 interchange will require some form of capacity augmentation, and the specific treatment should be determined in relation to the intersection capacity needs of the ramps and of Yorba Street.

Jamboree Road, north of Bryan Avenue to I-5: The southbound direction on this section of roadway is already augmented (except for a final widening project between El Camino Real and the northbound I-5 on-ramp). Future improvements on the northbound side were proposed for similar auxiliary lane treatment in the East Tustin Specific Plan.

Valencia Avenue: With the southward extension of Newport Avenue to Valencia Avenue, this roadway will need to be designated as an augmented primary.

Walnut Avenue, Tustin Ranch Road to Myford Road: Future volumes on this roadway indicate a need for augmentation, probably in the form of intersection treatment at Myford Road, as traffic from the industrial area in this vicinity is attracted to the future Eastern Transportation Corridor interchange with Walnut Avenue.

GRADE SEPARATED INTERSECTIONS

Jamboree Road south of Irvine Boulevard is part of Orange County's Smart Street (Superstreet) system, which makes it a candidate for various types of capacity enhancements. For the section south of I-5, Jamboree Road joins the southerly termination of the ETC west leg, and the planned capacity enhancements are in the form of grade-

separated intersections. The Warner Avenue intersection is already constructed as a grade-separated interchange, and grade separated interchanges are also planned for Edinger Avenue and Barranca Parkway.

ADDITIONAL CROSSINGS OF THE I-5 FREEWAY

The Arterial Highway Plan includes two crossings of the I-5 freeway which do not exist today. A discussion on each of these follows.

Browning Avenue

The existing Circulation Element includes a Browning Avenue overcrossing of the I-5 Freeway. Adequate development set-back has been established on the north site of the freeway to enable the overcrossing to connect with El Camino Real.

Long-range traffic forecasts for the overcrossing show a future demand of around 10,000 vehicles per day. This is well within the capacity of a four-lane secondary roadway (its current Circulation Element designation). The traffic forecast data indicates that future trips using the overcrossing are largely local in nature, and the facility will provide local traffic with an alternative to Redhill Avenue or Tustin Ranch Road as a means of crossing the freeway. Hence, it does not have any direct major role as a regional connection, and is primarily a local circulation facility.

Without the overcrossing, additional traffic would be carried by Redhill Avenue and Tustin Ranch Road and Walnut Avenue. The volume increases could cause the ADT link capacities on Redhill Avenue to be exceeded. Of more concern would be peak hour operational characteristics, particularly at Redhill Avenue, as additional turn movement traffic is generated at the Walnut Avenue and Nissan Road intersections. Special traffic operation strategies (including changes in lane configurations) could possibly be required at those locations and at the ramp intersections.

Browning Avenue is on the County MPAH, and hence, a detailed study would need to be undertaken to support any deletion of this facility. Since future volumes on both Redhill Avenue and Tustin Ranch Road will be influenced by future land uses in the event of closure of Marine Corps Air Station, any detailed studies for potential deletion of the Browning Avenue overcrossing should be made only after some general indication of any future land uses and infrastructure on the Base are established. Hence, at this time the

Browning Avenue overcrossing on the Arterial Highway Plan should be retained.

Myford Road

An overcrossing of Myford Road was considered during the planning work carried out for the East Tustin Specific Plan. Although the overcrossing was never placed on the City's Circulation Element, right-of-way was reserved for its construction should the need for such a facility be established in the future. The sections of roadway north and south of the freeway are on the City's Arterial Highway Plan. While future forecasts indicate that the north-south traffic demand in this area can be adequately carried by Jamboree Road and the west leg of the Eastern Transportation Corridor (ETC), such a finding is dependent on the capacity provided by the ETC west leg operating as a free facility. Until the ETC plans are more firmly established, Myford Road, including the overcrossing, should be a part of the City's Arterial Highway Plan.

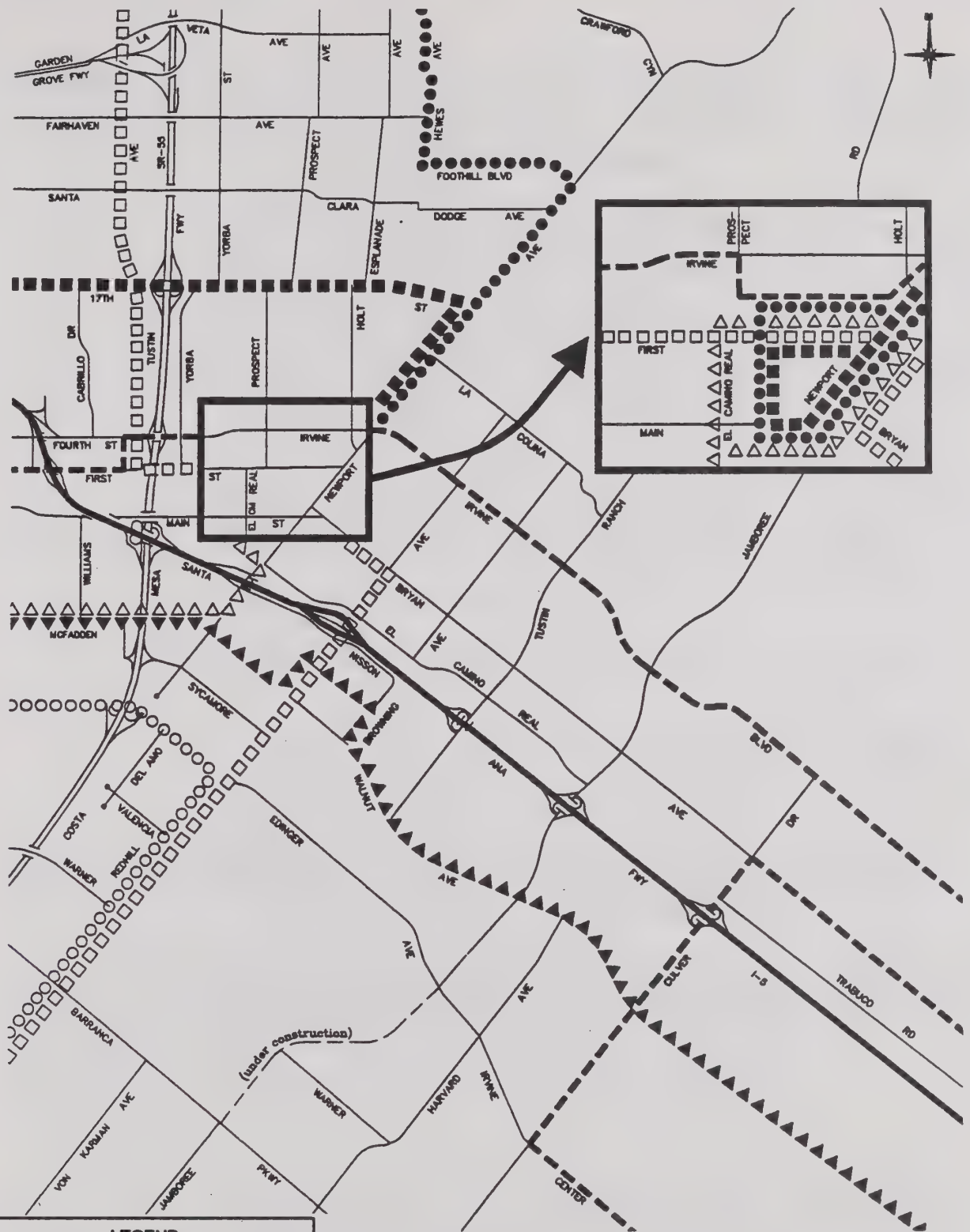
RELATIONSHIP TO COUNTY MPAH

The City's Circulation Element recognizes that the County of Orange's Master Plan of Arterial Highways (MPAH) considers augmented capacity arterials as those regionally significant arterials on the Smart Street (formerly Super Street) Network with an enhanced traffic-carrying capacity. Where such augmented capacity has been found necessary on those streets within the City, then it has been included on the City's Circulation Element. The Circulation Element further recognizes that the opportunities for and the benefits of the "Augmented Capacity" concept may also be realized at certain locations on other arterial roadways as a capacity enhancement strategy.

The highway component of the Circulation Element is consistent with the County MPAH, and as discussed previously, with the augmented qualifier in specific locations, is able to carry the projected traffic volumes.

PUBLIC TRANSIT

An existing network of public bus routes providing access to employment centers, shopping and recreational areas is illustrated in Figure C-3. Service is provided by the Orange County



LEGEND			
●●●	Route 22	△△△	Route 66
■ ■ ■	Route 60	□ □ □	Route 71
○ ○ ○	Route 61	▲ ▲ ▲	Route 75
● ● ● ●	Route 65	—	Route 85

TUSTIN
GENERAL PLAN

Figure C-3
Existing Public Bus Routes

Table C-6

OCTA BUS SERVICE THROUGH TUSTIN

LINE	ORIGIN/DESTINATION
Route 22	Brea Mall to Larwin Square via Newport
Route 60	Larwin Square to Long Beach via Newport and Seventeenth
Route 61	Santa Ana Civic Center to Fashion Island, Newport Beach via Edinger and Redhill
Route 65	Santa Ana to Balboa Peninsula via First, Prospect, Newport and Irvine
Route 66	Larwin Square to Golden West College/Huntington Center via Newport and McFadden
Route 71	Mall of Orange to UCI Marketplace via First, Newport, Bryan and Redhill
Route 75	Santa Ana Civic Center to Laguna Hills Mall via McFadden and Walnut
Route 85	Santa Ana Transit Center to Capistrano Beach via Newport, Nisson and I-5

Source: Orange County Transit District (OCTD) "Bus Book, Route Maps and Timetables" (1990).

Transportation Authority (OCTA). The established network includes Routes 22, 60, 61, 65, 66, 71, 75 and 85 and Table C-5 summarizes the origin and destination of these routes.

OCTA is also planning for future facilities and the completion of the Eastern Transportation Corridor (ETC) could introduce "Park-N-Ride" facilities into the area, thereby enhancing ridership for non-local trips. As noted in the policies for Goal 5, the City will continue to work with OCTA to provide additional service and encourage maximum use of public transportation.

BIKEWAYS

The existing bikeway system within the City of Tustin and the Planning Area is illustrated in Figure C-4. There is one Class I bike trail along Newport Avenue between El Camino Real and Irvine Boulevard, and several Class II lanes throughout the remainder of the

City and Planning Area. The network of bicycle routes is only partially established, and with few exceptions, most bicycles share street right-of-ways with automobiles.

To provide adequate accommodations in the future, a City Bikeway Plan has been developed. Missing links in the existing system and constraints for future routes were considered with the resulting Bikeway Plan illustrated in Figure C-5. Table C-7 describes and summarizes classifications relating to the Plan. The future network is comprehensive with several new facilities and extensions to existing routes. A conscious effort was exerted to ensure the Bikeway Plan achieved a continuity of routes and trails that did not terminate except at logical locations such as schools or parks.

A Class I trail is proposed along the Peters Canyon Wash on the eastern boundary of the City. This trail is part of the East Tustin Specific Plan and will also provide facilities for pedestrians and equestrians. The trail is part of the regional trail network.

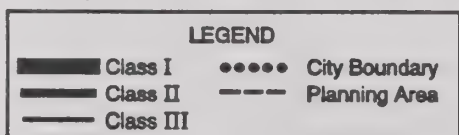
PEDESTRIAN CIRCULATION AND PARATRANSIT

As related to safety, guidelines are administered through the development review process for the construction of pedestrian facilities (i.e., sidewalks, paths, wheelchair ramps, etc.), based on City policy and federal/state mandates. Sidewalks are typically required as a condition of approval or permit issuance for all development. Wheelchair ramp curb improvements are also required to meet access provisions under the American Disabilities Act.

Paratransit services, or transportation services for the mobility-impaired, are provided by OCTA's Dial-A-Ride for senior citizens and the disabled, and by special services for senior citizens participating in programs at the Senior Center.

AIR

Air travel is available from John Wayne Airport (JWA) in Orange County, approximately five miles to the south by surface roadway. As the closest of the regional airports, JWA would be the major facility for air travel for Tustin residents. Other regional airports are located approximately 20-50 miles to the north in Long Beach, Ontario and Los Angeles.



TUSTIN
GENERAL PLAN

Figure C-4
Existing Bikeways

Table C-7

BIKEWAY CLASSIFICATION DESCRIPTIONS

CLASS I BIKE PATH or BIKE TRAIL

Provides a completely separated right-of-way designated for the exclusive use of bicycles and pedestrians; crossflows with motorized vehicles minimized.

Sizing: Minimum width for Class I (two-way) is eight feet. Desirable width is 10-12 feet. Minimum shoulder width of two feet each side.

Minimum width for Class I (one-way) is five feet. Minimum shoulder width of two feet each side.

CLASS II BIKE LANE

Provides a restricted right-of-way on a roadway's shoulder designated for the exclusive or semi-exclusive use of bicycles with thru travel by motor vehicles or pedestrians prohibited; vehicle parking and crossflows by pedestrians and motorists permitted. Vehicle parking in a Class II bike lane is not desirable and should be discouraged and/or restricted where possible. Additional lane width (12 feet minimum and 13 feet desirable) shall be required if on-street parking is permitted.

Sizing: Typical width of eight feet. A reduction in width to allow for restriping of an existing roadway or for added turning lanes may be permitted. In such cases, a five foot width, or gutter width plus three feet, whichever is greater, is the minimum width.

CLASS III BIKEWAY

Provides for shared use of roadway facilities. These bikeways share the street with motor vehicles or share the sidewalk with pedestrians. In both of these conditions, bicycle use is a secondary function of the pavement.

- References:
1. Caltrans "Planning and Design Criteria for Bikeways in California"
 2. County of Orange adopted standard Plans for Bikeways

A United States Marine Corps helicopter station is located in the southern portion of the City. The facility, which is government-operated, is not open for public use. The facility is planned to be closed in 1997, and the City is currently involved in a reuse study for the property.

RAIL

Passenger rail service is provided from two Amtrak depots in neighboring cities; Irvine to the east and Santa Ana to the west.

Commuter rail service is planned under the Los Angeles/San Diego (LOSSAN) Corridor Commuter Rail Action Plan. Commuter service within the corridor will require stations at various locations. One of the stations contemplated by OCTA for this system may be located in the City of Tustin in the vicinity of Edinger Avenue near Jamboree Road. At maximum operational capacity, the LOSSAN line could include as many as nine Commuter Rail round trips, nine Amtrack round trips, and four freight trains. Full implementation of service along the corridor is expected by 1995 and Tustin station development may coincide with that time frame.

The Orange County Transportation Authority is also evaluating the regional rail system through its Countywide Rail Study (CRS). This study is assessing congested traffic corridors and identifying rail and bus enhancements to the existing transportation system. While additional rail lines and improved service are being evaluated as part of this study, stops in Tustin are not currently proposed.

TRUCKING

Two routes have been previously identified for designated truck travel within the City of Tustin, including Irvine Boulevard along its entire length, and Redhill Avenue in the vicinity of Irvine Boulevard.

In addition to local streets where truck travel is prohibited, weight restrictions for commercial trucking have been imposed on several facilities and these are summarized in the following table:

HARBOR-PORT

The closest harbor facilities are located in the City of Newport Beach. Newport Harbor provides a variety of recreation opportunities including the chartering of private vessels and regular passenger service to other seaport destinations, such as Catalina Island. Commercial port facilities are located in the Cities of Long Beach and Los Angeles.

Table C-8
WEIGHT-RESTRICTIONS ON COMMERCIAL TRUCKING

<u>STREET</u>	<u>LOCATION</u>	<u>WEIGHT LIMIT</u>
"A" St	First St to Irvine Blvd	3 TONS
"B" St	First St to Irvine Blvd	3 TONS
"B" St	Main St to Sixth St	2 TONS
First St	Newport Ave to Redhill Ave	3 TONS
Garland Ave	Woodland Dr to Redhill Ave	3 TONS
Mountain View Dr	First St to Irvine Blvd	3 TONS
Olwyn Dr	Redhill Ave to Woodland Dr	3 TONS
Walnut Ave	Redhill Ave to Tustin Ranch Rd	3 TONS
Woodland Dr	Irvine Blvd to Olwyn Dr	3 TONS

CIRCULATION ELEMENT IMPLEMENTATION PROGRAM

Many of the Circulation Element policies call for specific implementing actions to be taken by the city. Other policies refer to subsequent programs and/or actions which will implement the provisions of the General Plan Circulation Element. The City Council, by incorporating the Implementation Program into the General Plan recognizes the importance of long-range planning considerations in day-to-day decision-making, subject to funding constraints. The following summarizes the various actions to be taken to implement the Circulation Element of the General Plan.

ARTERIAL HIGHWAY SYSTEM IMPROVEMENTS

1. Improvements to Arterial Highway System: Implementing the General Plan Circulation Element will require adding to or improving the existing arterial highway system. An implementation program to achieve this will monitor improvement priorities, establish funding sources, and incorporate the needed improvements into the City's Capital Improvement Program (CIP) on a regular (e.g. annual) basis. This program is related to the Growth Management Element which contains a mandate to identify short-range deficiencies and make necessary improvements. Specific implementing actions are as follows:

- Evaluate and if necessary refine the current CIP mechanism to ensure a formalized method of identifying the roadway improvements that need to be made in a five to seven year time frame.
- Establish guidelines for traffic impact fees so that an equitable means can be established for requiring new development to pay a fair share of the needed transportation improvements.
- Make an annual determination of potential sources of highway funding, such as Proposition 111 (Congestion Management), Measure M, and the recently established Santa Ana/Tustin TSIA.
- Coordinate improvement plans with regional activities so that improvements within the City will obtain maximum benefit from other improvement activities in surrounding jurisdictions. An example would be future improvements to Irvine Boulevard and Edinger Avenue, two designated CMP countywide roadways.

Responsible Agency/Department: Engineering/Public Works, City Council

Funding Sources: Developer exactions, Federal, State and County grants, City General Fund, other sources

Time Frame: Annual update

Related Circulation Element Policies: 1.1-1.17, 3.1-3.5, 8.1-8.3

2. At-Grade Railroad Crossings:

- Continue to encourage Southern California Regional Rail Authority (SCRRA) to set time schedules and limit train transfer activities of AT & SF to off-peak traffic hours.
- Through the Moulton Parkway Smart Street Project attempt to eliminate spur line crossings along Edinger Avenue and study the feasibility, costs and environmental impacts of a depressed or elevated grade separation at Red Hill Avenue rail tracks, north of Edinger Avenue.
- Explore State, Federal and local funding sources to finance construction of alternative types of crossings.

Responsible Agency/Department: Engineering/Public Works Department, City Council

Funding Source: State and Federal Grants

Time Frame: On-going

Related Circulation Element Policies: 1.3 and 3.4

3. Dedication/Improvements: The City shall:

- Establish setback lines for future right-of-way to protect ultimate roadway integrity.
- As part of development review, continue to require dedication of necessary right-of-way and improvement of streets at developer's expense pursuant to the Tustin City Code.

Responsible Agency/Department: Engineering/Public Works Department

Funding Source: Property Developer

Time Frame: On-going

Related Circulation Element Policies: 1.1, 1.15, 1.16, 5.2 and 5.7

4. Monitoring System: The City shall design and implement a land use and trip generation monitoring system to be used in determining a projects long range impact on the City street system.

Responsible Agency/Department: Community Development Department, Public Works Department

Funding Source: City General Fund

Time Frame: 1993-1994

Related Circulation Element Policies: 1.1, 1.6., 4.4 and 8.1

5. Monitoring Congestion: The City shall monitor congestion on major streets. As traffic volumes approach or exceed LOS D, increase capacity through restricting on street parking, improved signal timing, intersection widening and other traffic transportation system management measures.

Responsible Agency/Department: Engineering/Public Works Department, Community Development Department

Funding Source: State, Federal and local funding

Time Frame: On-going

Related Circulation Element Policies: 1.4, 1.5, 1.17, 4.1, 4.2, 7.2 and 7.4

6. Development Review:

- As part of development review, consider impacts of new driveway locations and midblock access points on traffic.
- Review all information on projects for consistency with Circulation Element.

- Review Traffic Demand Management (TDM) submittals and impose requirements consistent with the City's TDM Ordinance.

Responsible Agency/Department: Community Development Department, Engineering/Public Works Department

Funding Source: City General Fund, Property Developer

Time Frame: On-going

Related Circulation Element Policies: 1.1, 1.8, 1.10, 1.11, 4.3, 4.4, 6.5, and 7.1

INTERCITY AND REGIONAL TRANSPORTATION

7. Traffic Impacts Generated from Outside Sources:

- Continue to review and respond to Environmental documents for projects from other jurisdictions, specifically analyzing traffic related impacts to the City of Tustin.
- Continue to require measures of other jurisdictions to mitigate traffic impacts to the City of Tustin.
- Work within the powers of the Interjurisdictional Planning Forums and Joint Powers Agreements to discuss and evaluate new development proposals which may have traffic related impacts to the City of Tustin.

Responsible Agency/Department: Community Development, Public Works, City Council

Funding Source: City General Fund, County, other cities

Time Frame: On-going

Related Circulation Element Policies: 1.9, 1.10, 3.4 and 3.5

8. Intergovernmental Coordination: Continue to coordinate with the City of Santa Ana on Transportation System Improvement Authority (TSIA) projects.

Responsible Agency/Department: Community Development, Engineering/Public Works, City Council

Funding Source: City General Fund, State and Federal funding, T.S.I.A. funds

Time Frame: On-going

Related Circulation Element Policies: 1.16, 3.4, 3.5, and 8.1

9. Rail Transportation Network: Regional Orange County rail travel does include an Urban Rail System and the Commuter Rail (Metrolink) System as an alternative travel mode. The City shall:

- Continue efforts to work with the OCTA and adjacent cities in identifying a station site and available funding sources for the Commuter Rail system to serve the City of Tustin.
- Continue to monitor studies and participate in Urban Rail meetings.

Responsible Agency/Department: Community Development/Public Works Department

Funding Source: City General Fund, State and Federal Grants, Developer Contribution, Measure "M"

Time Frame: On-going

Related Circulation Element Policies: 1.6, 3.4, 3.7 and 3.8

TRANSPORTATION SYSTEM/DEMAND MANAGEMENT

10. Transportation System Demand Management Strategies: The Circulation Element requires maximizing the efficiency of the Circulation System through use of Transportation System Demand Management strategies. Implementing actions can be summarized as follows:

- Implement traffic signal coordination on arterial streets to the maximum extent practical.
- Encourage the implementation of Employer Transportation Demand Management (TDM) measures as required by the Southern California Air Quality Management District's Regulation 15 and by Proposition 111 as part of the Congestion Management Program.

- Require that major new non-residential developments include the submission of a TDM plan to the City, including monitoring and enforcement provisions.
- Require applicable developments to provide on-site, in a central location accessible to all employees and tenants, informational services that will enhance ridesharing and the use of other non-vehicular commute modes.

For public transportation, the desire to maximize transit use is contained in the Circulation Element. Implementing actions to be undertaken for this are as follows:

- Support the efforts of the appropriate transportation agencies, such as the Orange County Transportation Authority, to continually upgrade local and express bus service to and from the Tustin community and to provide Park and Ride lots near the freeways.
- Require new development to participate in transit amenities, such as bus shelters, turn-outs, landing pads and similar items.
- Coordinate roadway improvements with transit service so that where applicable, special features, such as bus turn-outs, can be provided in the improvement program.

Responsible Agency/Department: Engineering Division, Community Development

Funding Source: Developer exactions, Measure "M", Proposition 111

Time Frame: On-going

Related Circulation Element Policies: 3.7, 3.8, 4.1-4.6, 5.1-5.7

BICYCLE, PEDESTRIAN AND EQUESTRIAN FACILITIES

11. Alternative Transportation Modes: These components of the General Plan Circulation Element provide alternative modes of transportation (in the case of bicycle), and recreation-related facilities (in the case of bicycle, pedestrian, and equestrian). Implementing actions are as follows:

- Provide uniform standards and practices for the safety of pedestrians and bicyclists by providing adequate sidewalks, bicycle lanes, and off-road bicycle trails and requiring dedication and

improvement of these facilities where deemed necessary to meet public needs arising as a result of development.

- Include pedestrian walkway standards as requirements on new development.
- Coordinate the development and maintenance of bikeways with the work carried out by the County of Orange for the Master Plan of Countywide Bikeways.
- Encourage City-wide development to participate in transit amenities, such as bus shelters, turn-outs, and similar facilities.

Responsible Agency/Department: Community Development, Public Works

Funding Source: Developer exactions, Federal and State grants, City General Fund

Time Frame: On-going

Related Circulation Element Policies: 6.1-6.13

12. Sidewalks in Industrial Areas: Continue to study and implement, if feasible, the creation of an assessment district for sidewalk construction within each industrial area which would spread the cost of said sidewalk construction and administrative district costs over a multi-year payoff period or 10 or 20 years.

Responsible Agency/Department: Public Works Department

Funding Source: Assessment District

Time Frame: 1993/1994

Related Circulation Element Policies: 1.12, 1.16, 6.1, 6.2 and 6.8

PARKING

13. Parking Ordinance Study: The City shall complete a Parking Ordinance study which will include issues such as guest parking standards, shared use of parking facilities, parking for smaller vehicles and necessary changes to City codes and regulations.

Responsible Agency/Department: Community Development
Department

Funding Source: City General Fund

Time Frame: 1993

Related Circulation Element Policies: 2.3, 2.5, 7.1, 7.2, 7.3

FINANCING

14. Overall Capital Improvement Program:

- Review the City's Capital Improvement Program (CIP) in relation to the General Plan to ensure that circulation related projects are consistent with the goals, policies and programs identified in the General Plan.
- Annually review City's funding sources for street and lighting needs.

Responsible Agency/Department: Community Development, Public Works/Engineering

Funding Source: City General Fund, State and Federal funding, Measure "M", Landscape and Lighting District

Time Frame: On-going

Related Circulation Element Policies: 1.1, 1.6, 4.2 and 8.3

15. Scheduling Improvements: Schedule improvements as part of capital budgeting process. Improve the streets and intersections delineated in the Circulation Element.

Responsible Agency/Department: Public Works Department

Funding Source: City General Fund, State and Federal funds, Measure "M", TSIA

Time Frame: On-going

Related Circulation Element Policies: 1.6, 1.12 and 4.2

TUSTIN

GENERAL PLAN

Conservation \
Open Space \
Recreation Element

T U S T I N
GENERAL PLAN

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INTRODUCTION TO THE CONSERVATION, OPEN SPACE, AND RECREATION ELEMENT

Due to its location both on the coastal plain and in the Santiago Foothills, the Tustin Planning Area possesses a wide variety of natural and open space resources. Protecting, conserving, and managing these resources is the main purpose of the Conservation/Open Space/Recreation Element. The Conservation/Open Space/Recreation Technical Memorandum provides the necessary background information and supporting documentation for this element.

According to the California State Government Code, all general plans must include a conservation element and an open space element. For the City of Tustin General Plan, these two elements have been combined along with the optional Recreation Element, primarily due to the overlapping nature of the issues dealt with in the elements.

The conservation element deals primarily with the preservation of natural resources, such as water, soils, minerals, and animal life. An Air "Sub-element" is also included in the conservation element. The open space element deals primarily with the preservation of "open-space land", or land that is used for agricultural production, scenic enjoyment, and natural resource extraction, while the recreation element addresses recreational resources and needs. The commonality between the three elements includes preservation and management of natural resources.

PURPOSE OF THE CONSERVATION, OPEN SPACE, AND RECREATION ELEMENT

This Element meets State requirements concerning the Conservation and Open Space Elements as defined in Sections 65302d and 65302e of the Government Code. According to these requirements, the Conservation Element must contain goals and policies that further the protection and maintenance of the State's natural resources such as water, soils, wildlife, minerals, and other natural resources, and prevents their wasteful exploitation, degradation, and destruction.

The Open Space Element must contain goals and policies concerned with managing all open space areas, including undeveloped lands and outdoor recreation areas. Specifically, the Open Space Element must identify open space that is left undeveloped for public health and safety reasons and open space that is used for the preservation of natural resources, for the managed production of resources, and for outdoor recreation.

The Recreation Element identifies planned park and recreation facilities designed to support the recreational needs of Tustin's population.

While air quality is not a mandatory General Plan element, the South Coast Air Quality Management Plan now contains specific requirements for air quality to be addressed in the Plan. Air quality has been included as a sub-element to the Tustin Conservation/Open Space/Recreation Element to fulfill AQMP requirements. The purpose of the Air Quality Sub-element is to reduce current and projected emission levels through stationary source control measures; mobile source, transportation and land use control measures; and energy conservation measures.

RELATED PLANS AND PROGRAMS

There are a number of existing plans and programs which are directly applicable to the aims and objectives of this Element. These plans and programs were enacted through Federal, State, and local legislation and are administered by agencies or special districts that have been delegated with powers to enforce Federal, State and local laws. Federal laws that are concerned with the protection of significant cultural and natural resources include the Endangered Species Act of 1973 (as amended in 1978), the Antiquities Act and the National Historic Preservation Act of 1966 and the National Environmental Policy Act (NEPA).

California Environmental Quality Act Law and Guidelines

The California Environmental Quality Act (CEQA) was adopted by the State legislature in response to a public mandate that called for a thorough environmental analysis of those projects that might adversely affect the environment. The provisions of the law, review procedure, and any subsequent analysis are

described in the CEQA Law and Guidelines as amended in 1991. CEQA will continue to be instrumental in ensuring that the impacts of all potentially significant projects are assessed.

Air Quality Management Plan

In March of 1989, the South Coast Air Quality Management District and the Southern California Association of Governments (SCAG) adopted an Air Quality Management Plan designed to achieve the National Ambient Air Quality Standards. The act of adoption culminated in five years of work. The Plan laid out the most aggressive schedule for new rules in the history of air pollution control in Southern California.

In tandem, both the Air Resources Board (ARB) and the District were also busy adopting the first wave of new regulations called for under the 1989 Plan. Since the adoption of the Plan, the South Coast Air Quality Management District has witnessed significant regulatory achievements in reducing emissions from mobile and stationary sources and consumer products.

California Fish and Game Regulations

The California Fish and Game Code was adopted by the State legislature to protect the fish and wildlife resources of the State. Special permits are required for any lake or stream alterations, dredging or other activities that may affect fish and game habitat.

Other Plans

Plans and programs that contribute to the planning related to conservation, open space, and recreation include the following documents:

County of Orange Master Plan of Local Parks: The County's Master Parks Plan provides goals, objectives, and policies and provides implementation programs for a comprehensive county-wide park plan. In conjunction with the County's Local Park Code, specific criteria are intended to provide an adequate supply of usable county parkland. This Plan provides a regional

park planning context for the Tustin Conservation, Open Space, and Recreation Element.

County of Orange Master Plan of Regional Riding and Hiking Trails: The County's trails plan provides policies and programs to implement the future development and operation of the County-wide trails system. The Plan includes an inventory of existing and proposed trails and standards and criteria for new trails.

County of Orange Recreation Element: The Recreation Element of the County of Orange General Plan provides an inventory of existing and proposed parks and open space and includes the Master Plan of Local Parks and Trails component.

County of Orange Resources Element: The County's Resources Element includes an inventory of the County-wide resources such as agricultural, mineral, and wildlife resources, energy, water, air, open space, and cultural-historic resources. The element also includes goals, policies, and programs for the development, management, preservation, and conservation of the county's resources. This Element provides sources of regional information affecting the Tustin area.

SCOPE AND CONTENT OF THE ELEMENT

In addition to the Introduction, the Conservation, Open Space, and Recreation Element includes four sections: Summary of Issues, Needs, Opportunities, and Constraints; Goals and Policies; the Conservation and Open Space Plan; and the Recreation Plan. The issues, needs, opportunities, and constraints identified in the Technical Memorandum lead to the formulation of Goals and Policies designed to address the issues identified. The Plan specifically explains how the Goals and Policies will be achieved and implemented.

RELATIONSHIP TO OTHER GENERAL PLAN ELEMENTS

All Elements of a general plan must be internally consistent. This assumes an interrelationship between each element. The Conservation, Open Space, and Recreation Element contains

goals and policies which support goals and policies within each of the other elements.

The Conservation/Open Space/Recreation (COSR) Element relates to other elements in a variety of ways. The Land Use Element directly relates to the Element by designating areas of the City where open space/recreational opportunities exist and by designating resources that should be conserved. Jobs/housing balance issues addressed in the Land Use Element are directly related to the achievement of air quality goals which are addressed within this Element.

The City's Land Use Element contains two land use designations that encompass open space land uses: Public/Institutional and Planned Community Public/ Institutional.

Public/Institutional: The Public/Institutional designation includes a wide range of public and quasi-public uses distributed throughout the community such as schools, churches, child care centers, transportation facilities, public buildings and facilities, public utilities, libraries, museums, art galleries, community theaters, hospitals, cultural and recreational activities, community recreational facilities, and parks. Certain public institutional uses may be permitted within other land use designations when determined appropriate. In addition, land uses which support and are specifically related to the function of the primary institutional use may also be permitted. These support uses may include residential (for purposes of housing persons related to an institutional use), retail and service commercial, and industrial uses (e.g., warehousing for a city yard facility).

PC Public/Institutional: The range of permitted uses is identical to the Public/Institutional Land Use designation. To ensure compatibility of land uses permitted within the classification, with the character of surrounding development and within a development area, the location, land use type, density and building intensity standards will be specifically governed by Planned Community District provisions or adoption of a Specific Plan as authorized by the California Government Code.

The COSR Element's relationship to the Housing Element is conditioned by the need to serve a growing population's recreational needs in the areas of the City with the highest density. Also, housing requirements for land must be balanced by the need to conserve natural resources.

The Circulation Element attempts to provide an efficient and well balanced circulation system. The COSR Element includes multi-use recreation trails which can also serve as elements of the circulation system. In addition, the air quality component of the COSR Element is closely linked with the Circulation Element, in that both concerned with reducing vehicle trips and improving traffic flow.

The Public Safety Element relates to the COSR Element by designating areas which are unsafe for development such as fault line areas and floodplains. Although these areas are unsafe for intensive development, such lands may be suitable for recreation and open space purposes.

Similar to the Public Safety Element, the Noise Element relates to the COSR Element by discussing a health and safety related issue area. Techniques for reducing noise often involve open space or some sort of buffer zone between noise sources and noise-sensitive land uses.

SUMMARY OF ISSUES, NEEDS, OPPORTUNITIES, AND CONSTRAINTS

This section describes the issues, needs, opportunities, and constraints of the Tustin Planning Area relative to open space, conservation, and recreation.

AIR QUALITY

- State and federal air quality standards, especially ozone, are often exceeded.
- Extensive use of motorized transportation modes and large particulate generating uses in area contribute to poor air quality.
- Topography, climate, and emissions combine to create an air quality environment which must be managed for the public health, safety, and welfare.
- New regulations must be implemented to fulfill Air Quality Management Plan requirements. These regulations include trip reduction, jobs/housing balance, point source reduction, efficient land use, and alternate forms of transportation and energy.

NATURAL RESOURCES AND UNIQUE NATURAL FEATURES

Water

- Protection of domestic groundwater supply.
- Continued drought conditions highlight need for continuing conservation efforts.

Riparian Habitat

- Limited riparian habitat exists in the Planning Area.
- The northern half of the Peters Canyon retarding basin supports an assemblage of riparian vegetation which, when fully restored, would provide many plant and animal species with suitable habitat.

Eucalyptus, Cedar, and Redwood Trees

- The Eucalyptus groves and remaining Eucalyptus windrows in East Tustin lend a nostalgic rural and agricultural character to the local landscape. Many of these remaining Eucalyptus trees are dying or in need of substantial care.
- There is a Cedar/Redwood grove on a proposed passive community park site in the northeasterly portion of East Tustin that is unique and visually prominent.

Special Management Areas

- Peters Canyon retarding basin and wash offers opportunity for preservation and conservation of open space and natural amenities.
- Hillside areas in East Tustin and the northeasterly portion of Planning Area are an important identifying feature. There is significant potential to enhance City's living environment and overall image through creative and sensitive treatment of major topographic features.
- The Peters Canyon ridgeline is a prominent visual feature in East Tustin which should be protected.
- Natural hillside features and open space should be used to protect the public health and safety in areas of potential flooding, severe slope, poor soil conditions, or geologic hazards.

Managed Production of Resources

- Limited amounts of agricultural land remain in Tustin.
- Most of remaining farmland is designated Prime Farmland.

SOLID WASTE RECYCLING

- Southern California continues to generate increasing amounts of solid waste while landfill space is limited.
- Assembly Bill 939 mandated jurisdictions to reduce solid waste by 50 percent by the year 2000.
- Implementation of recycling and other solid waste reduction programs will require cooperation of local residents and businesses and a strong effort by City government.

ENERGY RESOURCE CONSERVATION

- Limited conventional energy resources require conservation and development and use of alternative energy resources.

HISTORIC, CULTURAL, ARCHAEOLOGIC, AND PALEONTOLOGIC RESOURCES

- There is a wide range of historically significant resources in Tustin.
- The Lighter-Than-Air-Hangars at the Marine Corps Air Station are included on the National Register of Historic Places. The base's future closure leaves the hangars' ultimate fate uncertain.
- Tustin's location and geology make it an important archaeological and paleontological resource area.

- Methods of protecting archaeological and paleontological resources while permitting development must be addressed.

PARKS AND OPEN SPACE SYSTEM

- A comprehensive integrated plan for parks, open space, and scenic highways does not exist, and so, a complementary system of such resources is difficult to create or maintain.
- Without the support of school facilities, Tustin faces a shortage of recreational facilities, especially in the southern and western portions of the community where densities are higher.
- The City currently has only 47 acres of existing local and community parks, but needs an additional 109 acres to serve its present population based on a standard of three acres per 1,000 persons. The sphere of influence contains 10 acres of parkland leaving it 69 acres short of meeting the needs of both existing and projected populations.
- Regional recreation facilities will be located in Tustin, requiring coordination with adjacent jurisdictions.
- Limited recreation space often precludes programs for all segments of population. Increasing population will aggravate this problem.
- Given the limited recreation space, careful planning is needed to provide a balance of diverse facility needs.
- The community's facilities are limited and disrepair would create a severe deficiency in facilities.
- The City has lost two parks - Utt Parkette and North Tustin/Santa Clara Parkette - due to freeway widening improvements.
- The City has limited resources, so various segments of community must assume some responsibility for providing facilities, services and programs.

- Land acquisition for park and open space purposes and development of recreational facilities must compete for very limited funding sources.
- As Tustin approaches buildout, little vacant or unplanned land remains, placing additional constraints on future recreational opportunities.

CONSERVATION, OPEN SPACE, AND RECREATION ELEMENT GOALS AND POLICIES

A substantial portion of the City's natural open space and biological habitat has been replaced with urban development. However, a significant portion of the community remains in a natural state in East Tustin. Although much of this area is being developed, the conservation of open space and natural landforms can help to preserve the character of the area. The future development of the area will respect these natural features of the community.

The goals and supporting policies included in this Element address specific issues and opportunities to conserve the City's remaining sensitive lands and to enhance the open space within the City.

AIR QUALITY

The quality of air in the South Coast air basin must be improved to meet state and federal mandates. Cooperation on a regional basis is necessary to achieve improvement of air quality.

GOAL 1: Reduce air pollution through proper land use, transportation and energy use planning.

Policy 1.1: Cooperate with the South Coast Air Quality Management District and the Southern California Association of Governments in their effort to implement provisions of the region's Air Quality Management Plan, as amended.

Policy 1.2: Design safe and efficient vehicular access to commercial land uses from arterial streets to insure efficient vehicular ingress and egress.

Policy 1.3: Locate multiple family developments close to commercial areas to encourage pedestrian rather than vehicular travel.

Policy 1.4: Develop neighborhood parks near concentrations of residents to encourage pedestrian travel to the recreation facilities.

Policy 1.5: Provide commercial areas that are conducive to pedestrian circulation.

Policy 1.6: Cooperate and participate in regional air quality management plans, programs, and enforcement measures.

Policy 1.7: Create the maximum possible opportunities for bicycles as an alternative transportation mode and recreational use.

GOAL 2: Improve air quality by influencing transportation choices of mode, time of day, or whether to travel and to establish a jobs/housing balance.

Policy 2.1: Reduce vehicle trips through incentives, regulations and/or Transportation Demand Management (TDM) programs.

Policy 2.2: Reduce total vehicle miles traveled (VMT) through incentives, regulations and/or Transportation Demand Management.

Policy 2.3: Promote and establish, where feasible, the use of incentives and regulations to reduce peak period auto travel congestion.

Policy 2.4: Participate in efforts to achieve increased designation, construction, and operation of High Occupancy Vehicle (HOV) lanes on local freeways.

Policy 2.5: Promote all forms of transit serving the City and the urbanized portions of Orange County.

Policy 2.6: Encourage non-motorized transportation through the provision of bicycle and pedestrian pathways.

Policy 2.7: Encourage employer rideshare and transit incentives programs by local businesses.

Policy 2.8: Manage non-residential parking supply to discourage auto use, while ensuring that economic development goals will not be sacrificed.

Policy 2.9: Encourage businesses to alter truck delivery routes and local delivery schedules during peak hours.

Policy 2.10: Implement Citywide traffic flow improvements outlined in the Circulation Element.

Policy 2.11: Promote State and Federal legislation which would improve vehicle/transportation technology and cleaner fuels.

Policy 2.12: Implement land use policy contained in the Land Use Element toward the end of achieving jobs/housing balance goals.

Policy 2.13: Integrate air quality planning with the land use and transportation process.

GOAL 3: Reduce particulate emissions to the greatest extent feasible.

Policy 3.1: Adopt incentives, regulations, and/or procedures to minimize particulate emissions from paved and unpaved roads, agricultural uses, parking lots, and building construction.

GOAL 4: Reduce emissions through reduced energy consumption.

Policy 4.1: Promote energy conservation in all sectors of the City including residential, commercial, and industrial.

Policy 4.2: Promote local recycling of wastes and the use of recycled materials.

NATURAL RESOURCES AND UNIQUE NATURAL FEATURES

Tustin possesses important natural resources and features that warrant protection, preservation, and management as the community grows.

GOAL 5: Protect water quality and conserve water supply.

Policy 5.1: Local drainage courses, channels, and creeks should be improved to protect vegetation and wildlife habitat wherever possible.

Policy 5.2: Protect groundwater resources from depletion and sources of pollution.

Policy 5.3: Conserve imported water by requiring water conservation techniques, water conserving appliances, and drought-resistant landscaping.

Policy 5.4: Support the expansion of reclaimed water production and use wherever possible and economically feasible.

Policy 5.5: Protect water quality by responsible agency support of enforcement of water quality standards for water imported into the County, and to preserve the quality of water in the groundwater basin and streams.

Policy 5.6: Coordinate water quality and supply programs with all responsible water agencies, and cooperate and participate in plan preparation and programs.

Policy 5.7: Reduce and eliminate contamination of water supply from industrial operations.

GOAL 6: Identify, designate, and preserve significant or unique riparian habitats.

Policy 6.1: Encourage the County of Orange to restore riparian habitat above the Lower Peters Canyon Retarding Basin to be used as off-site mitigation for biologic impacts associated with projects located inside or outside the Planning Area.

GOAL 7: Conserve and protect natural plant and animal communities.

Policy 7.1: Inventory unique or significant tree stands, with particular attention given to the cedar stand, eucalyptus groves, and eucalyptus windrows in East Tustin. Develop standards to retain or incorporate the eucalyptus windrows and groves into development plans where feasible. The redwood/sequoia stand will be retained within a park site and integrated into any future park design.

Policy 7.2: Conserve important plant communities and wildlife habitats, such as riparian areas, wildlife movement corridors, wetlands, and significant tree stands through the practice of creative site planning, revegetation, and open space easements/dedications.

Policy 7.3: Require development proposals in areas expected to contain important plant and animal communities to include biological assessments.

Policy 7.4: Require new development to revegetate graded areas.

Policy 7.5: Where feasible and consistent with flood control requirements, the treatment of Peters Canyon Wash should retain a natural appearance by minimizing concrete channelization, retaining or replanting indigenous vegetation and/or retaining open space areas along the drainage course.

Policy 7.6: Incorporate planting in new development areas in East Tustin to be compatible with the character and quality of the natural surrounding environment.

GOAL 8: Conserve and protect significant topographical features, important watershed areas, resources, and soils.

Policy 8.1: Develop standards to preserve the unique variety of land forms indigenous in hillside areas, and ensure that the development process is structured to ensure that grading and siting practice reflects the natural topography.

Policy 8.2: Control erosion during and following construction through proper grading techniques, vegetation replanting, and the installation of proper drainage control improvements.

Policy 8.3: Encourage the practice of proper soil management techniques to reduce erosion, sedimentation, and other soil-related problems.

Policy 8.4: Place restrictions upon and apply standards to the development of floodplain areas, ecologically sensitive areas and potentially hazardous areas.

Policy 8.5: Review applications for building and grading permits, and applications for subdivision for adjacency to, threats from, and impacts on geological hazards arising from seismic events, landslides, or other geologic hazards such as expansive soils and subsidence areas.

Policy 8.6: Site planning and architectural design shall respond to the natural landform whenever possible to minimize grading and viewshed intrusion.

Policy 8.7: Consider public acquisition of significant land resources for open space when funds are available.

Policy 8.8: Require geotechnical studies for developments that are proposed for steep slopes and where geological instability may be suspected. Where a precise location of the El Modena fault is determined, appropriate building setbacks shall be established per State law.

Policy 8.9: Significant natural features shall be preserved and incorporated into proposed development projects.

Policy 8.10: Mitigate the impacts of development on sensitive lands such as steep slopes, wetlands, cultural resources, and sensitive habitats through the environmental review process.

Policy 8.11: Encourage retention of permanent open space through dedication as a part of the development review/subdivision process.

Policy 8.12: Concentrate higher intensity uses in areas containing less sensitive landforms and preserve the most sensitive landform resources as open space.

Policy 8.13: Non-developable or constrained areas should be evaluated for possible use as open space or recreational use.

Policy 8.14: Design an integrated open space system in the City that includes landscaped medians and parkways in City streets, the City's park system, bicycle and pedestrian trail systems, and active and passive open space with consideration given to developing guidelines to integrate the system with private open space.

Policy 8.15: Preserve the open space value of the central Peters Canyon ridge by excluding buildings and overhead utility lines from being developed on top and careful siting and landscaping of structures adjacent to the ridgeline.

Policy 8.16: Site buildings and align roadways to maximize public visual exposure to natural features.

Policy 8.17: Maintain the natural profile and landform character of the "knoll" park site in East Tustin.

GOAL 9: Manage the production of economically valuable agricultural resources to achieve a balance between current market forces and long-term community values.

Policy 9.1: Provide the opportunity to continue using land for agricultural crops as an interim use prior to further development.

Policy 9.2: Minimize and eliminate the adverse impact of resource production activities, where possible.

SOLID WASTE RECYCLING

Managing the creation, use and disposal of solid waste is an essential part of life in an urban community.

GOAL 10: Reduce solid waste produced within City.

Policy 10.1: Implement policies of the adopted Tustin Source Reduction and Recycling Element and Household Hazardous Waste Management Element.

Policy 10.2: Achieve 25 percent source reduction by 1995 and 50 percent reduction by 2000 as mandated by AB 939.

Policy 10.3: Maximize public awareness of all source reduction programs, including opportunities for community feedback and school education.

Policy 10.4: Maximize integration of all source reduction programs.

Policy 10.5: Assist in the development of local, regional, and statewide markets for materials collected and processed through the source reduction programs.

ENERGY RESOURCE CONSERVATION

Energy resources are highly valued and their conservation is important for sustaining the community and meeting future demands.

GOAL 11: Conserve energy resources through use of available energy technology and conservation practices.

Policy 11.1: Encourage the use of new technologies and innovative building design, site design and orientation techniques which minimize energy use by taking advantage of sun/shade patterns, prevailing winds, landscaping, and building materials.

Policy 11.2: Maintain local legislation to establish, update and implement energy performance building code requirements established under State Title 24 Energy Regulations.

HISTORIC, CULTURAL, ARCHAEOLOGIC, AND PALEONTOLOGIC RESOURCES

Tustin possesses important cultural resources which provide a sense of history and origin. These resources can be conserved through proper recognition and planning.

GOAL 12: Maintain and enhance the City's unique culturally and historically significant building sites or features.

Policy 12.1: Identify, designate, and protect facilities of historical significance.

Policy 12.2: Retain and protect significant areas of archaeological, paleontological, or historical value for education and scientific purposes.

Policy 12.3: Development adjacent to a place, structure or object found to be of historic significance should be designed so that the uses permitted and the architectural design will protect the visual setting of the historical site.

GOAL 13: Preserve Tustin's archaeological and paleontologic resources.

Policy 13.1: Require a site inspection by certified archaeologists or paleontologists for new development in designated sensitive areas.

Policy 13.2: Require mitigation measures where development will affect archaeological or paleontological resources.

PARKS AND OPEN SPACE SYSTEM

The park and open space system in Tustin is a vital part of life in the community. The existing and future need for parks and open space can be met through a proactive effort addressing requirements for land, facilities, and programs.

GOAL 14: Encourage the development and maintenance of a balanced system of public and private parks, recreation facilities, and open spaces that serves the needs of existing and future residents in the City of Tustin.

Policy 14.1: Provide Tustin with a full range of recreational and leisure opportunities that reflect the community's current and future population size and demographic character.

Policy 14.2: Design new and renovated parks for convenient and accessible use by the disabled, elderly, and otherwise less mobile persons within the community.

Policy 14.3: Evaluate and, where feasible, utilize for low-maintenance greenbelts and multi-use trails, the opportunities offered by abandoned road and railroad rights-of-way, and similar environmentally impacted or unused linear open space.

Policy 14.4: Preserve public and private open space lands for active and passive recreational opportunities.

Policy 14.5: Coordinate with the Tustin Unified School District and other public and quasi-public agencies for the maximum feasible use of public facilities to meet recreational needs.

Policy 14.6: Encourage all future public neighborhood and community parks in the City to be designed as joint-use facilities contiguous with public schools and sharing playfields, playgrounds, and other amenities wherever possible.

Policy 14.7: Require the incorporation and maintenance of open space areas which are located within and primarily benefit particular subdivisions to be a financial responsibility of the benefitting property owners.

Policy 14.8: Encourage and, where appropriate, require the inclusion of recreation facilities and open space within future residential, industrial and commercial developments.

Policy 14.9: Ensure that the design and development of public open space results in low cost maintenance, visually unobscured, and readily accessible open space areas.

Policy 14.10: Explore and utilize an acquisition program for open space areas other than an in-fee acquisition; such as open space easements, leaseholds, land donations, and gift annuities.

Policy 14.11: Utilize zoning and land use control as a means to preserve open space areas.

Policy 14.12: Ensure that the City's laws and related implementation tools relating to park dedication and development (e.g., ordinances, regulations, in-lieu fee schedules, etc.) reflect current land and construction costs, and are, in fact, providing adequate park land and facilities concurrent with population growth.

Policy 14.13: Where sites become available, the City should explore the feasibility of their purchase for additional parkland or recreational facilities in the park service areas where deficiencies exist.

Policy 14.14: Coordinate with the County of Orange to ensure the soonest possible dedication and development of Peters Canyon Regional Park.

Policy 14.15: Ensure retention of the Tustin Ranch Golf Club as a private recreational facility which continues to be "open" and accessible to the general public and not restricted to use by adjoining property owner's associations or members.

GOAL 15: Coordinate local open space and trail areas with the regional facilities of the County and adjoining cities.

Policy 15.1: Support Orange County's acceptance of the Peters Canyon Regional Multi-use Trail.

Policy 15.2: Coordinate with and support efforts by County Community Services Area 5, the County of Orange, City of Irvine, and other local cities in providing trails, recreational facilities, and open space of value to Tustin Planning Area residents.

GOAL 16: Provide a range of informal opportunities and organized recreational, cultural, sports, and life enrichment programs and services which will enable community residents of all ages, interests, and abilities to participate and experience self-satisfaction, personal growth, and fulfillment in leisure activities.

Policy 16.1: Maintain a high level of public awareness as to the full range of park and recreation opportunities available to residents of the community.

Policy 16.2: Actively solicit and respond to the expressed needs and desires of participants (and non-participants) in the City's parks and recreation program.

Policy 16.3: Promote a constant level of perceived quality and a predictable level of budgeting for recreational programs and services.

Policy 16.4: Provide, as feasible, programs tailored to the needs of special segments of the community, including seniors, teenagers, single working parents, persons working nights, etc.

Policy 16.5: Utilize on a contract basis the expertise and specialized facilities of the private sector where it is more economical and can provide a service of equal or unique quality.

Policy 16.6: Maximize the utilization of existing parks, open space, and facilities within the community for recreational purposes.

Policy 16.7: Obtain the ongoing support of community groups, corporations, and other segments of the private sector in sponsoring specific parks, improvement programs, and special community events (e.g., Tiller Days, July 4th Celebration, etc.).

Policy 16.8: As long as MCAS Tustin operates, encourage the base to continue its own on-base recreation and leisure programs and services.

Policy 16.9: Cooperate with and provide active support for non-profit and other community organizations in the City which provide recreational programs which supplement or coordinate with City programs.

Policy 16.10: Work cooperatively with the Tustin Unified School District to provide after-school and other non-school hour activity programs.

Policy 16.11: Explore additional recreation programs in those areas of the City where recreational deficiencies exist.

Policy 16.12: Promote and support volunteerism and involvement in the community to enhance recreation programs and services.

GOAL 17: Operate and maintain existing and future parks and recreation facilities so they are safe, clean, and attractive to the public; and preserve, protect, and enhance both existing and potential natural recreation areas to ensure that long-term public investments and values are not unreasonably preempted, compromised, or prevented by neglect or short-term considerations.

Policy 17.1: Estimate and evaluate the cost of operating and maintaining parks and recreation facilities as an integral part of the park design and development process so that Tustin does not accept responsibility for parks and recreation areas which it may not be able to adequately maintain over the long run.

Policy 17.2: Require park designs (including landscape treatments, buildings, irrigation, etc.) that are durable, reasonably standardized, and economical to maintain.

Policy 17.3: Explore the creation, either directly or by condition of development plan approval, Special Benefit or Maintenance Districts and/or community facilities districts for all future public parks.

Policy 17.4: Conserve City resources by not accepting maintenance responsibilities for recreational facilities within Planned Unit Developments or similar development projects, which by location, layout, design, or otherwise, are limited in their value to non-residents or owners, and which are more properly the responsibility of a local Homeowners' Association or Commercial/Industrial Owners' Association.

Policy 17.5: Utilize, where feasible, significant landscape features and drainage corridors/flood control channels (e.g., Peters Canyon Wash) as potential multi-use trail rights-of-way and special-use trail rights-of-way and special use recreation sites wherever possible.

GOAL 18: Ensure that the recreational goals and policies are pursued and realized in an organized, incremental, and cost-effective manner and consistent with the City of Tustin's financial resources and legal authorities and the appropriate responsibilities of other agencies, the private sector, and individual and group users.

Policy 18.1: Incrementally promote a financially self-supporting system of recreational programs and facilities through various types of user fees and funding opportunities.

Policy 18.2: While promoting a self-supporting recreation system, explore means of providing low-cost programs to those who cannot afford to pay.

Policy 18.3: Identify, evaluate, and where possible, introduce appropriate revenue-generating activities into future community-level and regional-level parks and recreation centers, consistent with park dedication regulations.

Policy 18.4: Develop long-term agreements with the School District and, as appropriate, other agencies that will maximize joint-use and multiple-use of facilities, eliminate program uncertainty, and reduce overall operations and maintenance costs.

Policy 18.5: Conserve the City's Quimby Act authority by utilizing, wherever practicable, the City's broad powers to enact and enforce its General Plan, Specific Plan(s), Redevelopment Plan(s), and Zoning Ordinance to secure public and private recreation sites, open space, trails, and other related land use objectives of community planning significance.

RELATED GOALS AND POLICIES

Goals and policies of the other General Plan Elements also relate to conservation, open space, and recreation issues. A major requirement of all general plans is internal consistency. Table COSR-1 shows each element; conservation, open space, and recreation issues; and goals and policies which relate to both.

**TABLE COSR-1
CONSERVATION, OPEN SPACE, AND RECREATION
RELATED GOALS AND POLICIES BY ELEMENT**

Conservation, Open Space, Recreation Issue Area	Related Goals and Policies by Element						
	Land Use	Housing	Circulation	Noise	Public Safety	Conservation, Open Space, Recreation	Growth Management
Air Quality			4.3				
Natural Resources and Unique Natural Features	3.3, 3.4, 3.5, 9.4, 9.9						
Solid Waste Recycling							
Energy Resource Conservation		6.2, 6.3	5.4				
History, Cultural, Archaeologic, and Paleontologic Resources	5.5, 6.5, 10.1	5.5					
Parks and Open Space System	1.12		6.6, 6.7				

THE CONSERVATION AND OPEN SPACE PLAN

The Conservation and Open Space Plan describes the approaches to be used in implementing the Conservation, Open Space, and Recreation Element goals and policies. Implementation of any individual action program will be subject to further citizen input, funding availability and the discretion of the City Council. The Conservation and Open Space Plan identifies those measures implemented for conservation purposes, including air quality measures. The Plan also identifies undeveloped lands reserved for public health and safety, the preservation of natural resources, and the managed production of resources.

CONSERVATION AND OPEN SPACE FOR PUBLIC HEALTH AND SAFETY

Tustin must protect the public health and safety of the community. This involves identifying areas that pose a potential threat to health and safety and implementing proper planning techniques to minimize potential threats to health and safety. Improving air quality and minimizing soil-related and water quality hazards are vital components of conservation for public health and safety.

Air Quality

Air quality has become an issue of such regional and critical importance that the Southern California Association of Governments now requires local jurisdictions to address air quality within a separate element or as a major section of the General Plan. As a component of the Conservation/Open Space/Recreation Element, the air quality section provides direction for implementing programs which will support regional efforts to improve air quality in the South Coast basin. Goals 1 through 4 set forth the City's Goals for air quality and the policies established to attain those goals.

Of primary importance in attaining air quality goals is a coordinated regional effort. Tustin will cooperate with the

South Coast Air Quality Management District and the Southern California Association of Governments to implement the goals of this element and the Air Quality Management Plan (AQMP).

Transportation and Land-Use Control Measures: Measures related to transportation and land-use have been identified in the AQMP that need to be addressed at the local government level (i.e. City of Tustin). These measures are generally aimed at reducing the total number of vehicle trips, improving traffic flow, and utilizing clean fuels in motor vehicles. The 1991 AQMP includes twenty-four SCAG Tier I transportation and land use measures which are modifications to the 1989 AQMP.

The goal of the Transportation Control Measures (TCMs) is to influence transportation choices of mode, time of day, or whether to travel. The strategies also address fuel selection and applications of technology to motivate a shift from petroleum-based fuels.

The measures fall into four categories: demand management, system management, facility improvements, and technology-based.

- (1) Demand management is the effort to change motorists' behavior, and includes such measures as ridesharing and alternative work schedules.
- (2) System management addresses improvements in the transportation system, such as traffic signal synchronization, to make it function more efficiently.
- (3) Facility improvements are capital expenditures for such things as freeway widenings and construction of new facilities to improve traffic flow and reduce congestion.
- (4) Technology-based measures rely on the development of new vehicles, fuel, or power systems.

The goal of the Land Use control measures is to establish a regionwide effort to alleviate the current imbalance that exists between jobs and available housing and reduce vehicle miles traveled. Congestion on the region's freeway is exacerbated by this imbalance, because it leads to long commutes for large numbers of basin residents who must travel between abundant housing in the east to jobs in the west. A shift in future housing

and jobs to improve the balance can contribute to shorter trips and lower emissions.

Dust Control and Particulates: Grading activity, building, and road construction result in particulate emissions from both the materials used (including sealers, paints, and solvents) and construction methods (such as sawing wood, grinding concrete, and spraying paint).

Two strategies designed to reduce particulate emissions (PM10) to the atmosphere are: (a) storage and movement of fine particulate matter and (b) the paving of unpaved roads and parking lots.

Energy Conservation: Energy use contributes significantly to emissions of criteria pollutants as well as global warming gases. The District, in the pursuit of achieving all criteria pollutant air quality standards and reducing adverse global impacts, is committed to reduce energy-related emissions by implementing two major policies:

- Promoting clean energy
- Reducing the demand for energy

The AQMP calls for a significant increase in the use of alternative, cleaner types of energy, relative to the traditional petroleum-based fuels.

Energy conservation provides one of the major avenues of achieving clean air, providing resource diversity, and energy independence. The AQMP relies on the energy savings from future utility programs, building and appliance standards, and local government programs to provide the majority of savings necessary to meet conservation goals proposed in the 1991 AQMP until further program cost-effectiveness can be completed.

In addition to these energy conservation measures, the City of Tustin can also play a vital role in increasing the recycling of waste glass, paper and plastic throughout the City. The use of recycled materials by local glass and paper manufacturers lower air emissions due to decreased energy consumption.

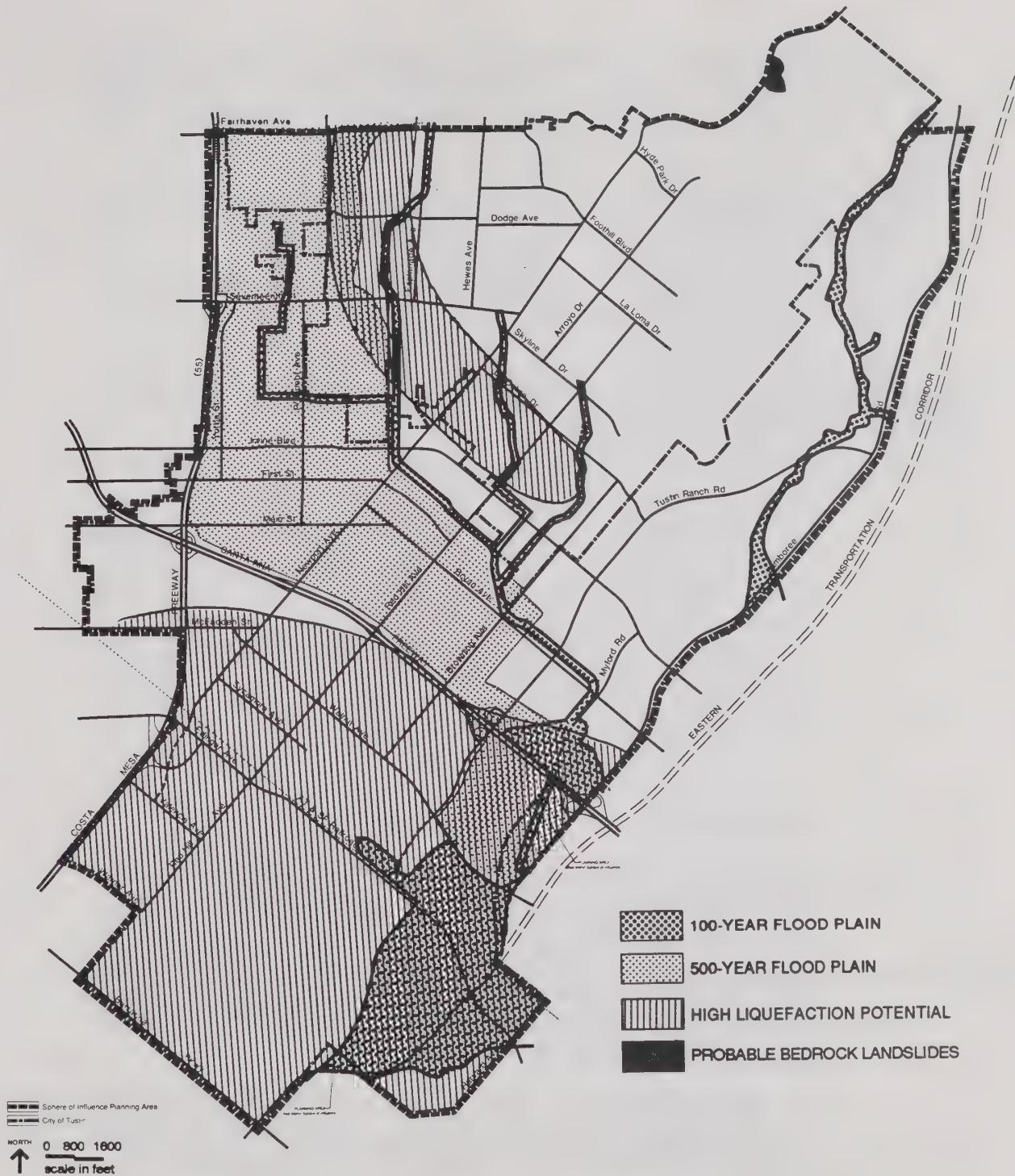
In 1989, the State approved comprehensive recycling and source reduction legislation in the form of AB 939. That bill requires cities and counties to adopt source reduction and recycling elements designed to divert 25 percent of all solid waste from landfill or transformation facilities by January 1, 1995 through source reduction, recycling, and composting activities. With some exceptions, cities and counties are also required to divert 50 percent by January 1, 2000. This legislation should lead to significant increases in the current level of recycling.

The City of Tustin has adopted a Draft Source Reduction and Recycling Element, which permits the City to meet the goals of AB 939. The City's element addresses the following eight components: Source reduction, recycling, composting, special waste, public education and information, disposal facility capacity, funding, and integration.

Soil Related Hazards

Figure COSR-1 depicts the areas in the community which require special planning considerations to avoid potential hazards. Three soil related safety problems are seismic hazards, soil liquefaction, and landslides. As none of the geologic fault systems within Tustin are known to be active, they are not identified on Figure COSR-1; however, if the Division of Mines and Geology should determine that the El Modena Fault, or any other faults within the Planning Area, are active, Figure COSR-1 will be modified to identify those active faults, and additional actions necessary to protect public health and safety will be prescribed.

Areas within the Planning Area have been identified as susceptible to liquefaction or potential bedrock landslides. These areas are identified on Figure COSR-1. When development is proposed within these areas, studies shall be performed as directed by the City to determine the potential for hazards and the amount of development which is supportable on the site.



TUSTIN
GENERAL PLAN

Figure COSR-1
Hazard Planning Areas

The following techniques can be used to acquire or dedicate land for open space to protect public health and safety or to preserve natural and cultural resources described in the next section:

Open Space Easements - pursuant to the Open Space Easement Act of 1974 (Government Code Section 51070 et seq.).

Conservation Easements - pursuant to the Conservation Easement Act (Civil Code Sections 815-816).

CONSERVATION AND OPEN SPACE FOR THE PRESERVATION OF NATURAL/CULTURAL RESOURCES

The most significant natural resources in Tustin include land with open space potential, lands with biological resources, water resources, prominent landforms, and those sites or structures which have historical, archaeological, or paleontological resources. Peters Canyon is the largest remaining undeveloped area within the City. This area contains some coastal sage scrub vegetation which could support a variety of animal species with some revegetation. These important natural resource areas are shown on Figure COSR-2.

Water Resources and Riparian Habitats

The 1990 Groundwater Management Plan outlines strategies for conserving water resources in Orange County. The Plan outlines the following five goals for conserving water in Orange County: 1) increasing basin water supplies, 2) protecting and enhancing water quality, 3) improving basin management, 4) improving relations with constituents, and 5) improving Orange County Water District management and operation.

The City of Tustin is participating in several programs to improve basin management and decrease reliance upon imported water. One program is the Nitrate Removal Demonstration

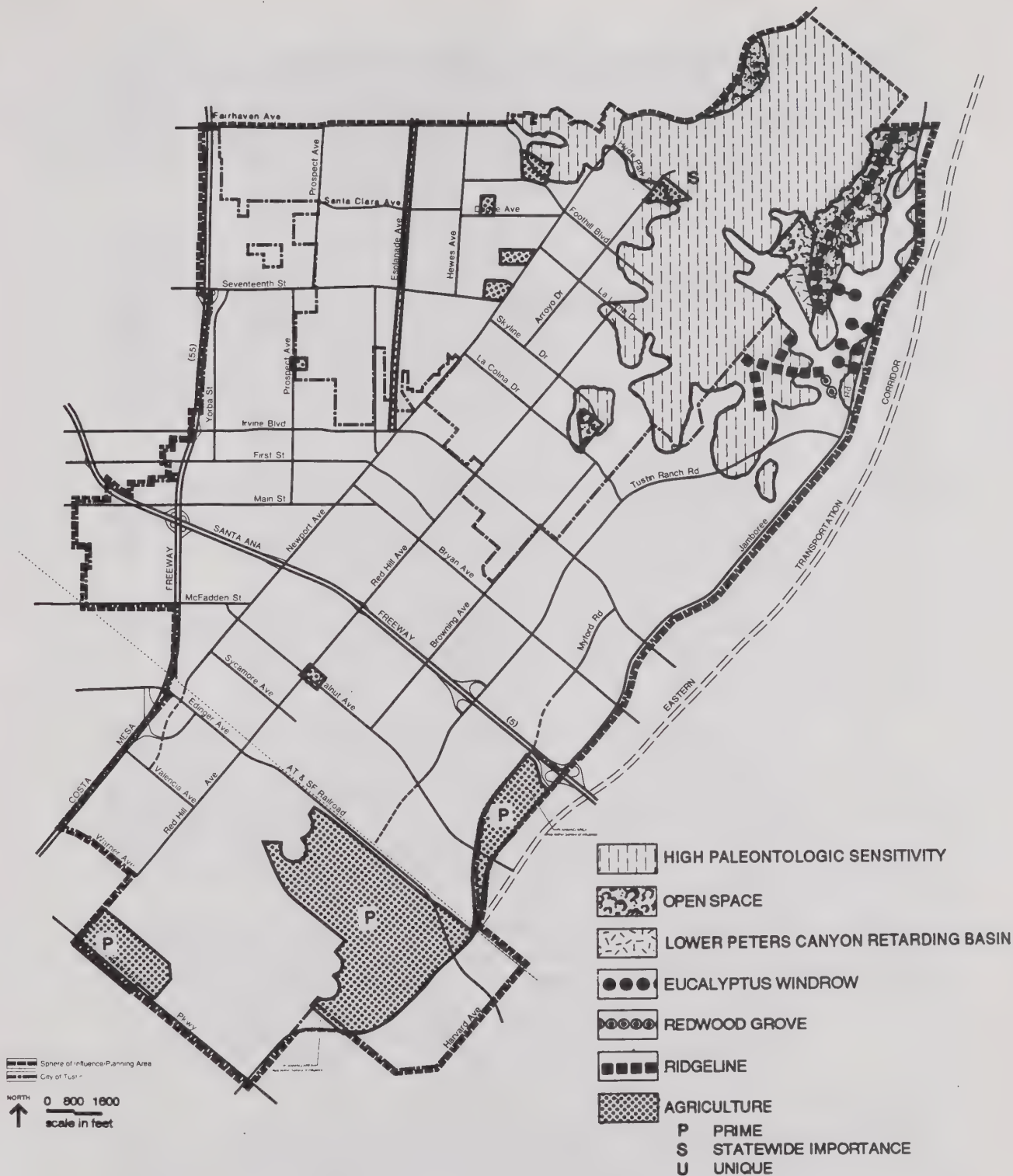


Figure COSR-2
Important Natural Resources

Project mentioned above. The OCWD has constructed a Demonstration Treatment Plant which removes nitrates from groundwater in the wells at the City's Main Street Plant. If this program is successful, wells in Tustin and elsewhere in Orange County that are currently closed due to high nitrate levels may undergo similar treatment to permit reopening.

A second water improvement program is the proposed Seventeenth Street Desalter. The well at the City's Seventeenth Street Plant and the Newport Avenue well site are closed due to high nitrate levels and high levels of total dissolved solids. With treatment, these wells could produce an additional 2,800 acre-feet of water per year. An agreement for the construction of this plant will be presented to the City Council in the near future.

A third program is the MWD Seasonal Storage Program. This program gives local agencies financial incentives to store water through the winter months, thus reducing peak loads in the drier summer months.

A fourth program is the OCWD Conjunctive Use Well Program. This program offers local agencies low interest loans for construction of up to three wells.

An additional method of managing the groundwater resources is using reclaimed water. The Irvine Ranch Water District supplies reclaimed water by the Michelson Water Reclamation Plant, a 15 million gallon per day facility. Although the water is of near potable quality, it is used strictly for irrigation purposes. The Irvine Ranch Water District services East Tustin.

The City of Tustin also promotes water conservation, through its water conservation ordinance. The ordinance, "Finding and Determining the Necessity for Adopting a Water Management Plan" identifies water conservation stages and water use limitations. The Water Management Plan ordinance specifies water conservation stages and prohibited activities during each stage.

Water resources and features, including watersheds and riparian habitats, are very important to Southern California, and riparian habitats are quite rare. The most prominent water feature in Tustin is Peters Canyon. Several mitigation measures were adopted for Peters Canyon as part of the East Tustin Specific

Plan. These mitigation measures continue to reflect City policy. For several years, the Lower Peters Canyon Retarding Basin contained a small riparian habitat. This habitat severely deteriorated in recent years. The City will work with the County of Orange, which recently constructed a replacement dam, to preserve the riparian area and implement active measures to increase water supply to restore the habitat area.

Plant and Animal Communities

In addition to the riparian habitat, two other plant groups provide significant benefits to Tustin. These are the Coastal Sage Scrub and the imported trees - Eucalyptus and Cedar stands. These have been preserved through the East Tustin Specific Plan and EIR. Coastal Sage Scrub is home to some of California's sensitive or endangered species such as the California Black-tailed Gnatcatcher, the San Diego Cactus Wren, and the San Diego Coast Horned Lizard. The Coastal Sage Scrub itself is now very limited and needs careful management. The City and Orange County are planning the Peters Canyon Regional Park which will assist in preserving most of Tustin's existing Coastal Sage Scrub. The development of Peters Canyon Regional Park must take into consideration the preservation and improvement of the sensitive plant and animal communities within its borders.

The General Plan also mandates the continued maintenance of significant tree stands. Healthy trees have been identified through the Eucalyptus Study performed in 1988 and shall be cared for to maintain their health. As existing healthy trees die or become irreversibly damaged, they shall be replaced. The study makes several recommendations which the City will observe. Among the nine recommendations are selective pruning, removal of dead plant material, appropriate irrigation, and the minimization of heavy equipment use within 20 feet of the tree trunks.

Policies within this Element support these previous efforts. The redwood/cedar grove has already been protected by including it within a new park. In addition, new developments will require a biological assessment. Biological resources which are important to the local ecosystem or to the City's aesthetic environment will be integrated into the new development.

Topography, Soils, Paleontology, and Archaeology

Topographical features, soils, paleontologic, and archaeologic features are all generally most affected by earthmoving and subsequent urban development. This Element requires the utilization of standards to preserve the unique landforms existing within the Planning Area. The City has very detailed standards and requirements for grading that are designed to protect sensitive topographic, soil, paleontologic, and archaeologic resources. The Tustin Grading Manual prescribes appropriate measures to protect the earth by controlling erosion, sedimentation, and storm damage.

Proper grading, soil management, and open space standards will work to preserve these resources. Sensitive locations will be identified, and their preservation will be a high priority for the City during any project review. As new resources are identified in the City, they will be documented as features or resources the City desires to preserve.

To further protect paleontological and archaeological resources, a records search will be performed prior to a development. If no record of resources exist, a field survey will be performed. Any proposed project which is located within a sensitive area as defined by Figure COSR-2, or is identified through a subsequent study, will require a licensed paleontologist or archaeologist to be present on the site to observe grading or other earthwork.

Historic Resources

Tustin's many fine historic homes are very important resources to the community. The City conducted a historic survey in 1990 and maintains a historic preservation district. Significant structures outside the district are also protected by the City. In addition to City recognition, the National Register of Historic Places designates the Lighter-than-Air Hangars on MCAS Tustin and the Orange County Historical Commission recognizes the Hewes House and the First Advent Christian Church. Figure COSR-3 identifies current historic resources within Tustin.

Cultural Resources District: The Tustin Cultural Resources District was established in response to growing concerns over future development in Old Town. The purpose of the Cultural Resources District is to provide a framework for recognizing,

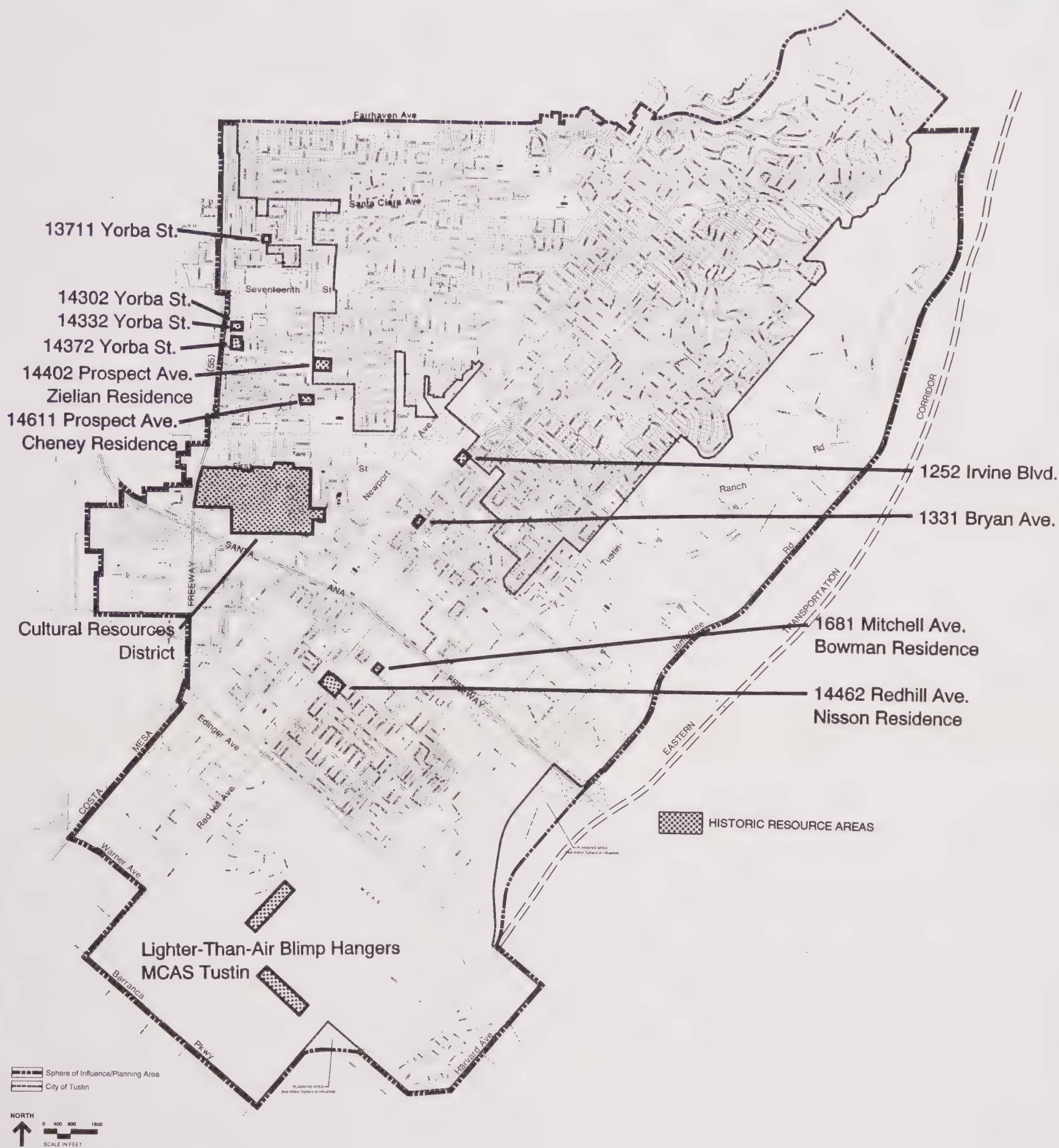
preserving, and protecting culturally significant structures, natural features, sites, and neighborhoods within the City of Tustin. The District includes much of the area within the original City boundaries.

The Cultural Resources District ordinance establishes criteria for use in designating cultural resources and Cultural Resources Districts and the procedures to be followed in making such designations. Final action of any designation must be approved by the City Council. Certificates of Appropriateness are required for improvements within Cultural Resource Districts or upon Designated Cultural Resources when such improvements require a City building permit.

The preparation of a historic resources survey enables a city to apply for status as a Certified Local Government (CLG). The Certified Local Government Program is a federal program which allows a city to participate more directly in historic preservation efforts. Application is made through the State Office of Historic Preservation. A CLG is eligible for matching grants which can be used for a variety of historic preservation efforts. Tustin has submitted a Certified Local Government Application and the application has been approved.

Scenic Resources

As new development is considered by City decision makers, public views should be preserved as much as possible. Consideration will be given to protecting public views along the ridge lines, views toward the inland mountains and along scenic transportation corridors. Figure COSR-4 conceptually identifies significant public scenic resources in Tustin.



SOURCE: City of Tustin (1991).

TUSTIN
GENERAL PLAN

Figure COSR-3
Historic Resources

Solid Waste Recycling

The need to conserve landfill space has been addressed by recent State legislation. Assembly Bill 939 mandates the preparation of a Source Reduction and Recycling Element for solid wastes. This is not an element that is required to be incorporated into the General Plan. Goal 10 of this Element is the reduction of solid waste in the City. Specific policies set forth by the City include implementing the Source Reduction and Recycling Element, maximizing integration of source reduction programs, and maximizing public awareness. These goals and policies are set forth explicitly in the Source Reduction and Recycling Element. While that element is not a part of the General Plan, the City's intention is to implement it, and the General Plan fully supports that element as City policy.

Energy Resource Conservation

Tustin's location in the foothill region of Orange County makes it well suited to taking advantage of solar power.

Design of buildings and subdivisions should take the mostly sunny winters and the hot summers into consideration. Southern exposures in the winter and limited western exposure in the summer are both important. Streets which run east-west are more adaptable to solar energy practices than north-south streets. The ideal building orientation for the Southern California coastal inland regions has been recommended as a 35 degree variation to the southwest of the building's long axis. State Title 24 Energy Regulations establish energy performance Building Code requirements that the City will follow and implement.

CONSERVATION AND OPEN SPACE USED FOR THE MANAGED PRODUCTION OF RESOURCES

Open Space areas for the managed production of resources with regard to this section include agricultural lands and areas containing major mineral deposits. The conservation of open space areas for the managed production of resources does not directly affect lands within the City of Tustin Planning Area.

The City of Tustin is an urbanized community and contains limited undeveloped land. Very little of this undeveloped land is currently used for commercial agriculture, and it is unlikely that any will be used in the future. The remaining agricultural uses are considered to be interim uses which can continue to exist until further development of such lands is approved by the City.

The only mineral resource identified within the Tustin Planning Area is the Mercury-Barite deposit in Red Hill (the hill). However, this resource is not utilized.

THE RECREATION PLAN

The Recreation Plan describes the approach to be used in implementing the goals and policies of this element pertaining to recreation resources and opportunities. The recreation facilities in Tustin play an important part in the lives of Tustin residents. Tustin has been developed with several open space amenities including local public and private recreational facilities, pedestrian and bicycle trails, equestrian trails, and other public open spaces. Soon, the City will contain part of the Peters Canyon Regional Park. Opportunities exist to provide strong linkages between these open space resources to form a cohesive system of open space.

RELATION TO LAND USE PLAN

The City's Land Use Plan places open space, parkland, and recreational facilities into the Public/Institutional land use category.

The Public/Institutional designation includes a wide range of public and private uses distributed throughout the community such as schools, churches, child care centers, transportation facilities, government offices and facilities, public utilities, libraries, museums, art galleries, community theaters, hospitals, cultural and recreational activities, and community recreational facilities and parks. The Plan also permits Public/Institutional uses in other land use designations when the use serves a local need and is compatible with surrounding development.

PARK CLASSIFICATION AND STANDARDS

The Recreation Plan establishes a classification system that applies to all existing and future park and recreation facilities in the City. Specific standards, based upon existing parkland, have been developed for each category of park or recreation area. The existing parks and recreational facilities are listed on Table COSR-2. Proposed park and recreation facilities are listed on Table COSR-3.

General Standards

The State of California Planning and Zoning Law and the Subdivision Map Act Code Section 66477 (The Quimby Act) indicate that the legislative body of a City or County, may, by Ordinance, require the dedication of land, the payment of fees in lieu thereof, or a combination of both, for park and recreational purposes as a condition to the approval for a final tract map or parcel map. In cases where such dedications or fees have not been obtained for particular lots through a map, they may be imposed at the time that building permits are issued. Among other requirements, the following conditions must be met:

- The Ordinance must include definite standards for determining the proportion of a subdivision to be dedicated and the amount of any fee to be paid in lieu thereof; and
- The legislative body has adopted a General Plan containing a Recreation Element, and any proposed park and recreational facilities are in accordance with definite principles and standards contained therein.

In conformance with this statute, the City of Tustin Conservation, Open Space, and Recreation Element includes standards determining land requirements for future park sites. The standards identified in Table COSR-4 and in the following text should be utilized in selecting sites for parks and should serve as guidelines governing the acceptance of land dedicated to the City. Future acquisition should focus on acquiring land for parkettes and neighborhood and community parks as well as obtaining easements and property for trails. Generally, parkettes are not cost effective to maintain and this will be considered prior to acceptance of dedication. Figure COSR-5 presents the Tustin Recreation Plan for parks and other recreational open space facilities.

TABLE COSR-2
EXISTING CITY PARKS AND RECREATIONAL FACILITIES

NAME	LOCATION	ACRES	FACILITIES
1. Camino Real	Park Center At Camino Real	4.3	Preschool & school-age apparatus, basketball court
2. Centennial	Sycamore & Devonshire	8.0	Group picnic area, preschool & school-age apparatus, fitness course, horseshoe pit, basketball courts, volleyball courts
3. Columbus Tustin	Prospect & Irvine	13.0	Basketball courts, football/soccer field, softball fields, tennis courts, volleyball courts, gymnasium (under construction)
4. Frontier	Mitchell & Utt	4.5	School-age apparatus, frisbee golf, fitness course, horseshoe pit, softball fields, barbecue grill
5. Magnolia Tree	Cherrywood & Fig Tree	4.2	Preschool & school-age apparatus, basketball court, tennis courts, barbecue grill
6. McFadden-Pasadena	McFadden & Pasadena	0.4	Picnic tables
7. Peppertree	First & C	5.1	Preschool apparatus, fitness course, horseshoe pit, youth ball fields, barbecue grill
8. Pine Tree	Redhill & Bryan	4.2	Preschool and school-age apparatus, volleyball courts
9. Clifton Miller Community Center	300 Centennial Way	0.10	Meeting room, auditorium, microphones, kitchen
10. Tustin Area Senior Center	200 South C Street	0.40	Meeting rooms, game room, auditorium, microphone, kitchen, pool tables
11. Laurel Glen Park	Heritage & Myford	3.0	Passive park with picnic facilities and a tot lot
TOTAL ACRES		47.2	

**TABLE COSR-3
PROPOSED CITY PARKS AND RECREATIONAL FACILITIES**

SITE	NET NEW ACREAGE	LOCATION	PROPOSED FEATURES (examples only)
Community Center	17.0	Jamboree and Portola	Multipurpose/cultural arts facility, citrus groves, open space
Active Sports Complex	20.0	Jamboree and Robinson	Lighted softball/soccer fields, tennis courts, multipurpose court, racquetball court
Picnic Area/Nature Center	9.0	Pioneer Way	Group picnic facilities, nature/community center, redwood/cedar trees
Neighborhood Park ⁽¹⁾	3.0	Pioneer Way	Unknown
TOTAL ACRES	49.0		

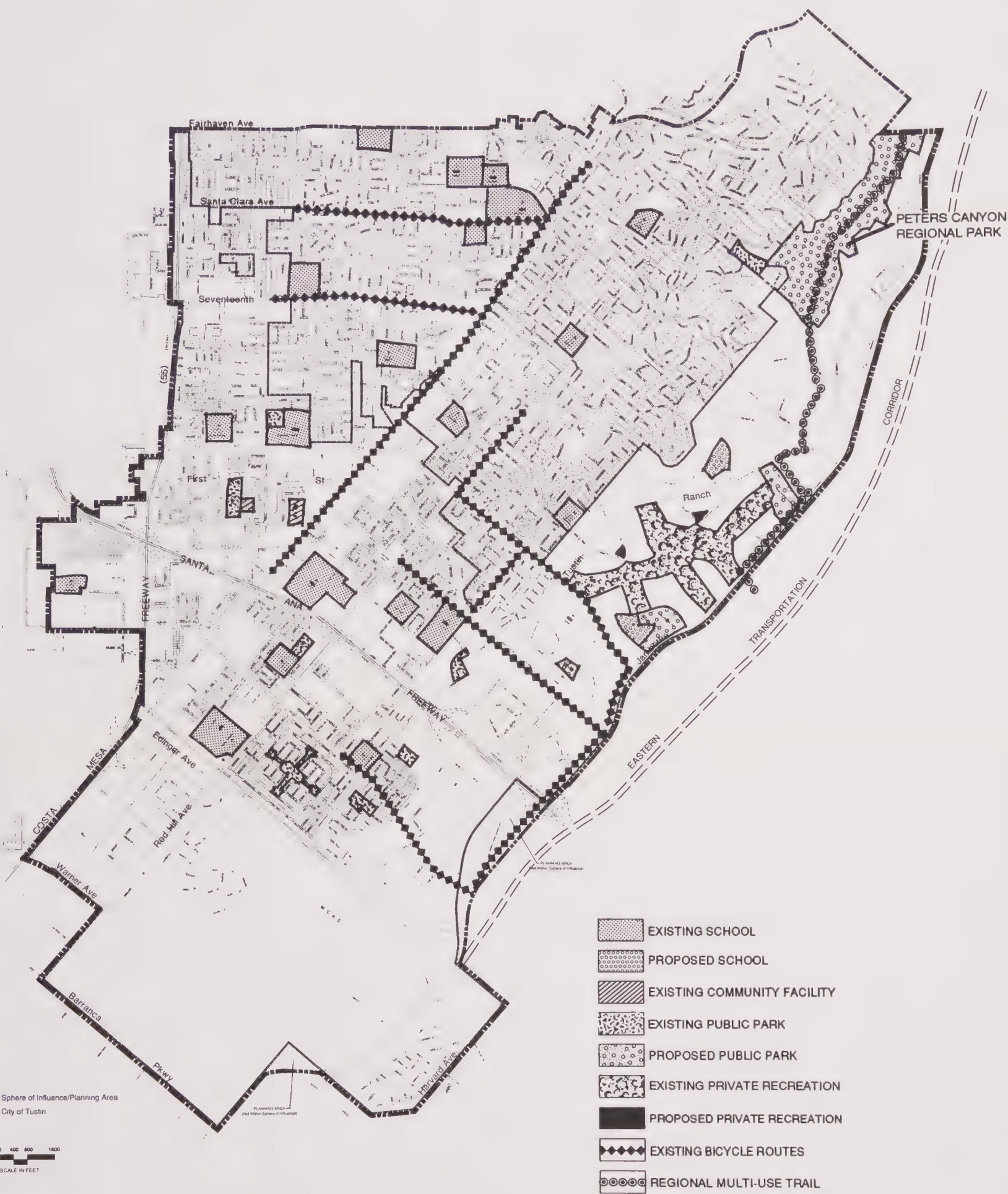
(1) Additional 2.7 acres held in reservation may be included if the need is determined.

**TABLE COSR-4
EXISTING AND FUTURE PARK ACREAGE NEEDS**

	Acreage Required			Available Acreage from Existing and Proposed Parkland		Surplus/ (Shortfall) of Acreage	
	Popula- tion ³	Parks ¹ 3.0 acres/ 1000	School Play- grounds 1.5 acres/ 1000	Parks	School ² Playgrounds	Parks	School Playgrounds
Existing City	52,145	156	78	47	61	(109)	(17)
Future City	68,488	204	102	96	90	(108)	(12)
Existing SOI	25,235	76	38	10	52	(66)	14
Future SOI	26,266	79	38	10	52	(69)	14

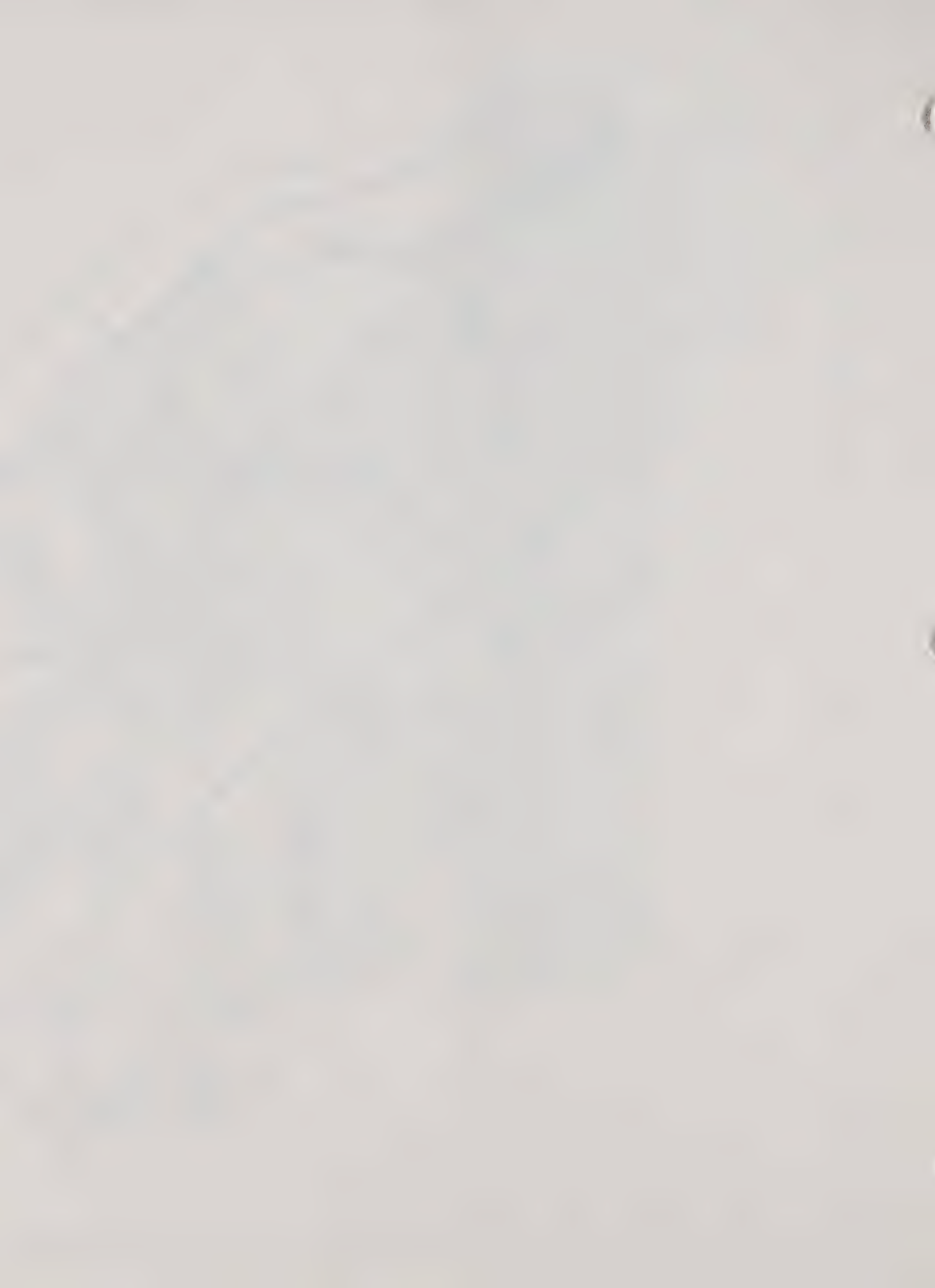
Source: Standards: City of Tustin, Community Services Department.
Population Data: Cotton/Beland/Associates

- 1 This standard is satisfied by neighborhood and community parks. Peters Canyon Regional Park is not used to meet this standard.
- 2 School playground acreages are based on the assumption that 35 percent of approximately 400 acres of land associated with schools is used for recreational purposes.
3. Projected population for purposes of establishing parkland acreage needs.



SOURCE: City of Tustin, Recreational Resources in the Tustin Area (1990)

Figure COSR-5
Recreation Plan



Parkettes

Parkettes are small, passive, local parks, generally less than one acre in size. Most parkettes are established in higher density areas as a substitute for backyards. Size and location are usually determined by the availability of vacant land. These parks may serve any age group, depending on the characteristics of the neighborhood. They usually feature play apparatus, a paved area for wheeled toys, benches, and landscape treatment. They may also feature children's play areas, quiet game areas, and some sports activities such as multi-purpose courts, if space allows. Some mini-parks are natural areas with minimal improvements (e.g., benches) which safeguard identified archaeological/paleontological sites or other natural resources, or serve as viewpoints. As the City approaches build-out, it becomes more important to take advantage of opportunities available to the City for the establishment of park space. Parkettes could be established in areas that lack conveniently accessible parkland. The maintenance costs of proposed parkettes requires consideration prior to acceptance of dedication.

Neighborhood Parks

Many of the facilities located within neighborhood parks are associated with active recreation. All neighborhood parks should contain some area for active recreation depending on the size of the park.

The park site should contain consolidated parcels with appropriate area devoted to active recreation such as ball fields, multi-purpose fields and open turf, game courts, tot lots, picnic facilities, swimming pools, community buildings, and on-site parking. The standard minimum size for neighborhood parks is three acres.

Neighborhood parks should be located near the center of a neighborhood unit and, if possible, adjoining an elementary school. Easy access should be provided to pedestrians, bicyclists, and maintenance and public safety vehicles. A neighborhood park should not be separated from its user population by major highways, railroads, or other untraversable obstacles. A neighborhood park should be situated adjacent to or near greenbelts, open space linkages, or other community open

space/recreation facilities to facilitate an open space system throughout the City.

Community Parks

Community parks are intended to serve an approximate population of 10,000. No specific shape is required for community parks as they are intended to incorporate both active recreational facilities and passive open space in the form of unique physical features such as a ridgeline. Community parks should be a minimum of eight acres. Community parks should encompass pedestrian and bicycle paths and natural open space.

Community parks should contribute to the City's open space system by connecting to neighborhood parks through open space linkages or connecting to other recreational facilities. They should be located at or near the intersection of an arterial near the center of their service area. Community parks should contain space for active recreational facilities such as gamefields, game courts, swimming pools, and play areas as well as community centers, on-site parking, restrooms, and picnic areas.

Regional Parks

The County of Orange owns and maintains many regional recreational facilities. Policy for the development, maintenance, and improvement of these parks is provided by the Orange County Recreation Element, which includes a Master Plan for regional recreational facilities in the County.

The County does not currently have any regional parks in Tustin. However, Peters Canyon Regional Park is planned and should open in the near future. The City also supports the County in locating other regional park facilities in the City.

School Playgrounds/Joint Agreements

Public school playgrounds under the jurisdiction of the Tustin Unified School District are open to the public after school hours. Organized sports leagues such as those for baseball, soccer, and football utilize ballfields through a permit process with the School District. The City includes some school

recreational facilities to meet the overall goal of three acres per 1,000 population. Up to 1.5 acres per 1,000 population can be provided through school recreation areas provided the school recreation areas are open to the public.

Opportunities exist to maintain and enhance school/recreation joint use agreements with the Tustin Unified School District. Whenever feasible, the City should work to improve agreements with schools to enter into a joint school/recreation use and maintenance program.

Biking/Hiking Trails

The County of Orange maintains a coordinated system of trails, including bikeways, equestrian trails and hiking trails within the City. The Tustin Community Services Department disseminates public information regarding trail availability, and assists with design review of new trails.

Bikeways comprise the most extensive part of the City's trail network. There are three categories of bikeways:

- **Class I:** a paved path that is separate from any motor vehicle travel lane;
- **Class II:** a restricted lane within the right of way of a paved roadway for the exclusive or semi-exclusive use of bicycles; and
- **Class III:** a bikeway that shares the street with motor vehicles or the sidewalk with pedestrians.

The biking network in Tustin connects with other trails and paths in adjacent communities and throughout Orange County. Several new bike trails and paths have been proposed.

A number of policies included in this Element are concerned with the expansion of the City-wide system of hiking and biking trails. Precise development standards for the various types of trails are difficult to establish since trail width and gradient will depend on topography, surface features, and availability of an easement. The City's trail system includes pedestrian and bike trails within open space corridors and along regional trails which link to local and regional parkland. The bikeways located along

the City's street system are addressed in the City's Circulation Element.

Other Recreational Facilities

In addition to its parks and trails, Tustin has many private recreational facilities. While some private facilities (e.g., private parks, tennis courts, swimming pools) are available only to the residents of the general particular complex in which they are located, others are available to the public for a fee (e.g., Tustin Ranch Golf Course). The City encourages the inclusion of such facilities in private development, especially those open to the public.

FUTURE RECREATION FACILITIES

Identifying areas which will be adequately served by existing park facilities and areas for which new parks will be needed is possible by comparing projected build-out for the City with the standards and criteria of this Element. The implementation program for this Element includes a plan showing the approximate number and location of additional park facilities, by category, according to the specific criteria outlined in this Element. This information will be used as a reference tool, along with the above criteria, for planning the acquisition and siting of park facilities.

CONSERVATION, OPEN SPACE, AND RECREATION ELEMENT IMPLEMENTATION PROGRAM

The Conservation, Open Space, and Recreation Element Implementation Program provides a guide to the community, City Staff, and City officials in day-to-day decision-making by suggesting ways to implement adopted policy. Implementation measures for the Conservation, Open Space, and Recreation Element are intended to preserve natural resources, maintain public health and safety, and provide for the recreational needs of the City's inhabitants. The Implementation Program is a series of actions, procedures, and techniques that carry out the Element policy through implementing a standard or program. The City Council, by incorporating the Implementation Program into the General Plan, recognizes the importance of long-range planning considerations in day-to-day decision-making, subject to funding constraints.

AIR QUALITY

The Air Quality Management District (AQMD) has adopted the 1991 Air Quality Management Plan (AQMP), an advisory document which identifies a number of air pollution reduction goals, measures and policies. Local jurisdictions have been mandated to reduce a fair share proportion of vehicle generated air pollution through the adoption of a menu of optional Transportation Control Measures (TCMs) which have been determined by the local agency to be politically and economically feasible. The AQMD is currently drafting a Backstop Measure to ensure that local agencies meet their fair share allocation.

The Orange County League of Cities has provided each Orange County city its fair share trip reduction goal. The City of Tustin has been recently recognized as having met 122% of its allocated vehicle trip reduction goal. Therefore, it is currently assumed that the City will not need to adopt any additional Transportation Control Measures to comply with the 1991 AQMP. In addition, the City closely monitors air quality matters with the intent of complying with future revisions of the AQMP. Therefore, the mitigation measures and policies identified within this document or other measures acceptable to the AQMD will be implemented by the City who will have the discretion to select those

transportation control measures that are economically feasible and will achieve compliance with the 1991 AQMP.

1. Person Work Trip Reduction: Adopt or amend a Transportation Demand Management (TDM) ordinance requiring trip reduction programs for the City, as an employer, and other major employers within the city, to reduce employee personal motor vehicle trips by 12% by July 1, 1999, 20% by 2004, and 30% by 2010 (implements Tier 1 Measure 1.a of the 1991 AQMP).

Responsible Agency: Community Development/Public Works

Funding Source: City General Fund/TDM Fees

Time Frame: January 1, 1993

Related C/OS/Recreation Element Policies: 1.6, 2.2-2.5, 2.7, 2.8

2. Non-Motorized Transportation: Amend the City's TDM ordinance incorporating non-work trip reduction provisions requiring: (1) major retail centers to offer customer mode-shift travel incentives and provide facilities for non-motorized transportation needs; and (2) large capacity special event centers (over 10,000 seating capacity) to include park-n-ride and off-site facility lots, auto free zones, street closure during peak periods, and enhanced transit performance as appropriate (implements Tier I Measures 1.b, 2.d, and 2.e of the 1991 AQMP).

Responsible Agency: Community Development/Public Works

Funding Source: City General Fund

Time Frame: January 1, 1994

Related C/OS/Recreation Element Policies: 1.5, 1.7, 2.1, 2.2, 2.5, 2.6, 2.8

3. Rideshare and Transit Incentives: Adopt or amend a TDM ordinance incorporating strategies for employers of over 100 people and those of over 25 people, encouraging the formation of Transportation Management Associations, and encouraging employer van pool programs and use of clean fuel vans (implements Tier I Measure 2.a of the 1991 AQMP).

Responsible Agency: Community Development/Public Works/ Administrative Services

Funding Source: City General Fund/TDM Fees

Time Frame: January 1, 1993

Related C/OS/Recreation Element Policies: 1.6, 2.1-2.8, 2.10, 2.11

4. Parking Management: Conduct a local assessment and amend the City's TDM ordinance which encourages reductions in parking needs. Such an ordinance will promote the following measures: increased daytime parking fees, parking surcharge for single-occupant vehicles, parking discounts for multiple-occupant vehicles, no peak hour on-street parking, no 100 percent employer subsidized parking, preferential parking for ridesharers, residential parking permit programs near commercial centers, increased parking enforcement, caps on number of parking spaces provided, monitoring of progress, and market incentive measures adopted by Growth Management and Traffic Task Force (implements Tier I Measure 2.b of 1991 AQMP).

Responsible Agency: Community Development/Public Works

Funding Source: City General Fund

Time Frame: January 1, 1994

Related C/OS/Recreation Element Policies: 2.6-2.8

5. Truck Scheduling: Adopt an ordinance restricting truck deliveries to off peak hours and instituting a truck accident

reduction program (implements Tier I Measure 3.a of the 1991 AQMP).

Responsible Agency: Community Development/Public Works

Funding Source: City General Fund/TDM Fees

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 2.9, 2.10

6. Traffic Flow Improvements: Implement traffic signal synchronization where feasible at Citywide intersections and pursue cooperation with adjacent jurisdictions to implement interjurisdictional traffic signal coordination.

Responsible Agency: Public Works

Funding Source: City General Fund/Measure M Funds/Other State and Federal Funding

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 1.6

7. Growth Management: Develop intergovernmental agreements and the City may elect to adopt a local ordinance to attain targeted reduction of Vehicle Miles Travelled and growth management goals of the Growth Management Plan (implements Tier I Measure 17 of the 1991 AQMP).

Responsible Agency: Community Development/Public Works

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 1.6

8. Paved Roads: The City will study whether to adopt an ordinance restricting outdoor storage of fine particulate matter,

requiring liners for truck beds and covering of loads, and controlling construction activities and emissions from unpaved areas, and paving areas used for vehicle maneuvering or areas otherwise identified by the Air Resources Board (implements Tier I Measures 12.a and 12.b of the 1991 AQMP).

Responsible Agency: Community Development/Public Works

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 3.1

ENERGY CONSERVATION

9. Congestion Management: Participate with the Orange County Transportation Authority in defining and implementing the County's Congestion Management Plan.

Responsible Agency: Community Development/Public Works

Funding Source: City General Fund/Measure M and Proposition III Funds

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 1.6, 2.1, 2.2, 2.13

10. Interagency Communication/Coordination: Participate in available communication networks with key elected officials and staffs involved in air quality planning as the basis for identifying and implementing programs which effectively reduce airborne pollutants.

Responsible Agency: Community Development/All Affected Departments

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 1.1, 1.6, 2.2, 2.11, 4.1

11. Development Projects: Continue to require participation in transportation demand management programs for development projects which have been determined to have a potential impact on air quality.

Responsible Agency: Community Development/Public Works

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Policies: 1.6, 2.1, 2.2

12. Transportation Network: Explore the development of a Tustin Area Transportation Network as a forum for communication and cooperating among Tustin Area Employers and employees to comply with Regulation XV.

Responsible Agency: Administrative Services

Funding Source: City General Fund

Time Frame: January 1, 1994

Related C/OS/Recreation Element Policies: 1.1, 1.6, 2.1, 2.2, 2.5, 2.7, 2.8

13. Peak Period Trip Reduction: Evaluate and develop a program to use flex time, staggered and modified work hours, and telecommunication for City employees.

Responsible Agency: Administrative Services

Funding Source: City General Fund

Time Frame: July 1, 1993

Related C/OS/Recreation Policies: 1.6, 2.1, 2.3

14. OCTA Commuter Match-up: Require City employee participation in the Orange County Transportation Authority's Commuter Match-Up program.

Responsible Agency: Administrative Services

Funding Source: City General Fund

Time Frame: January 1, 1993

Related C/OS/Recreation Element Policies: 2.7, 2.8

15. Guaranteed Ride: Undertake a guaranteed ride home and lunch program for City employees using fleet cars made available to employees who participate in trip reduction programs.

Responsible Agency: Administrative Services

Funding Source: City General Fund

Time Frame: January 1, 1993

Related C/OS/Recreation Element Policies: 2.7, 2.8

16. Alternative Fuels: Investigate the conversion of City vehicles to use propane fuel.

Responsible Agency: Public Works/Administrative Services

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 2.11

17. Energy Conservation: Monitor legislation to establish, update, and implement energy performance building code requirements established under State Title 24 Energy Regulations. Consider adopting an ordinance requiring increased thermal integrity, increased efficiency of building systems and major appliances, and reduced thermal loads and

solar gain; and through development review, require project design to accommodate local climatology and solar orientations (implements Measures CM# 90 E-D-1A, 1B, E-C-1A, 2B, and E-C-2 of the 1991 AQMP).

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 4.1, 11.1, 11.2

18. Building and Site Design: Encourage energy efficient building and site design during review of new development projects and support innovative building and site design for all new public buildings.

Responsible Agency: Community Development/Building Division

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 11.1, 11.2

19. Public Building Energy Conservation: Ensure that energy saving devices are installed on new public buildings and when retrofitting existing public buildings.

Responsible Agency: All City Departments

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 11.1, 11.2

20. Passive Energy Conservation Techniques: Provide information brochures at the Building Division counter regarding

orientation techniques that minimize electric and fuel burning energy use, and maximize the use of passive solar energy.

Responsible Agency: Community Development/Building Division

Funding Source: City General Fund

Time Frame: January 1, 1993

Related C/OS/Recreation Element Policies: 11.2, 11.3

21. Energy Conservation Education: Budget for and encourage City staff to attend education programs offered by the Energy Commission. Explore new technology and revenue generation from new sources of technology.

Responsible Agency: Community Development/Building Division

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 11.2, 11.3

SOIL RELATED HAZARDS

22. Identify Soil Hazards: Through the City's development review and subdivision review processes, identify soil related safety problems associated with proposed development, determine the potential for hazard, determine the amount of development supportable on the site, and require appropriate mitigation of new development impacts.

Responsible Agency: Community Development/Public Works

Funding Source: Development Review/Subdivision Review Processing Fees

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 7.2, 8.4, 8.5, 8.8, 8.12, 8.13

23. Grading Regulations: Amend the City Grading and Excavation Code and Grading Manual to require: a) landscaping plans to be prepared and revegetation to occur as early as feasible as part of grading activity; b) review of development plans for sensitive siting and grading treatments, particularly within designated hillside areas; and c) preparation of erosion control plans with grading which identify location of interim drainage facilities, diverters and siltation areas.

Responsible Agency: Community Development/Engineering Division

Funding Source: City General Fund

Time Frame: January 1, 1993

Related C/OS/Recreation Element Policies: 7.4, 8.1, 8.2, 8.3, 8.6

WATER RESOURCES AND RIPARIAN HABITATS

24. Improve Water Quality: Implement programs designed to improve water quality including Nitrate Removal Demonstration Project and Seventeenth Street Desalter.

Responsible Agency: Public Works

Funding Source: City Water Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 5.2, 5.5, 5.6

25. Conserve Water Resources: Practice water conservation in the following ways: a) participate in regional programs such as the Seasonal Storage and Conjunctive Use Well program; b) support increased use of reclaimed water for the Tustin Ranch Golf Course, landscaped medians, and other uses by the Irvine Ranch Water District in East Tustin; c) continue to provide

informational brochures/handouts on water conserving plumbing devices and other forms of water conservation as technology becomes available; d) utilize an inverted block rate structure to encourage water conservation by charging low water users less money; e) adopt a water efficient landscaping ordinance; f) utilize drought resistant landscaping in development of public projects; g) support the development of an expanded water line system for the use of reclaimed water; and h) incorporate the use of water saving devices and drought tolerant plant materials on City-owned park sites to keep water costs to a minimum.

Responsible Agency: Community Development/Public Works/Finance Division/Water Services Division

Funding Source: City General Fund/Water Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 5.2-5.7, 5.11, 14.9, 17.2

26. Flood Control Improvements: Support efforts for environmentally sensitive improvements to floodplains by: a) coordinating with Orange County Flood Control District, b) incorporating applicable standards and requiring revisions to development plans to satisfy City provisions for floodplain management.; and c) responding to environmental studies related to drainage courses, channels, and creeks that will have impacts on the City.

Responsible Agency: Community Development/Engineering Division/Planning Division

Funding Source: Orange County Flood Control/City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 5.1, 5.5, 7.5, 8.1-8.5

27. Peter's Canyon Wash: Support the maintenance of Peter's Canyon Wash as an open natural channel through the East Tustin Golf Course, and support the County's maintenance of

the Wash north of the reservoir in a natural state including the development of a design concept for the Peter's Canyon Regional Park incorporating a natural wildlife habitat.

Responsible Agency: Community Development/Engineering Division/Planning Division; private golf course owner

Funding Source: Private funds/OCFD/State

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 5.1, 6.1, 7.2, 7.5

28. Water Quality: Promote improved water quality by the following methods: a) support the Santa Ana Watershed Protection Authority Programs; b) support the Regional Water Quality Control Board Programs and the National Pollution Discharge Elimination System stormwater permit regulations; c) support the efforts of the Orange County Water District to monitor the Santa Ana River water quality; d) enforce the State Department of Health Services well construction standards; e) provide assistance and information to the Federal Environmental Protection Agency, the State Department of Health Services, and Orange County Health Department enforcement program during investigation, regulation and enforcement of water pollution restrictions; f) provide information to industrial operations within the City on methods to reduce or eliminate water contamination; g) work with the Orange County Water District, if financially feasible, to construct facilities adjacent to existing water wells to purify well water and increase production and use of local water; and h) develop local ordinances to regulate the dumping of pollutants into ground water.

Responsible Agency: Public Works/Water Services Division

Funding Source: City Water Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 5.2, 5.4-5.7

PLANT AND ANIMAL HABITAT

29. Biological Resource Restoration: Assist the County of Orange in development of plans and programs for restoration efforts in areas of unique riparian habitat.

Responsible Agency: Community Development

Funding Source: No funding necessary

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 6.1, 7.2, 7.5, 14.14

30. Tree Preservation: Promote tree preservation by: a) requiring development and implementation of reforestation plans to recreate the character of the existing eucalyptus groves within the hillside areas of the East Tustin Specific Plan; b) preserving unique stands of trees on publicly owned facilities and properties; c) requiring CC&Rs or private party agreements with the City where unique stands of trees are included on commonly owned property or privately owned property to insure the preservation, health and vitality of such trees where feasible; d) requiring all plans for grading and construction activity within proximity to identified preserved stands of trees be reviewed by a qualified arborist to ensure that proposed activities and improvements will not impact the trees, and that recommendations of the arborist be incorporated into development plans; and e) establish an inventory of significant stands of trees in the City which would be marked for preservation consideration when reviewing development proposals.

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 6.1, 7.1-7.3, 7.5, 7.6

31. Natural Community Conservation Plan: To maximize protection of the California Gnatcatcher and its habitat of coastal sage scrub, the City shall continue to participate and support the State of California Resources Agency Natural Community Conservation Plan for coastal sage scrub.

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 7.2, 7.3, 7.4

32. Protection of Biological Resources: Biological resources in the City will be protected by requiring development project proponents to perform biological surveys in areas known or suspected to contain significant biological resources. The biological survey shall be prepared by a professional biologist and the following issues shall be addressed therein:

- a) identification, mapping, and acreage of the various plant communities and habitat types; b) delineation of wetlands; c) identification of sensitive plant and animal species; d) identification of whether property is enrolled in the Natural Community Conservation Plan for coastal sage scrub; e) potential wildlife movement corridors; and f) ecological function of on-site habitat. Biological resource surveys should be conducted at the appropriate times of the year to ensure observation of all potential occurring plant and animal species.

TOPOGRAPHY, SOILS, PALEONTOLOGY, AND ARCHAEOLOGY

33. Protect Soils and Topography: Protect soils and topography within the City by: a) reviewing and incorporating provisions of detailed soils reports for development into approved plans as provided for in the City Grading and Excavation Code; b) incorporating standards and guidelines of the East Tustin Specific Plan and Grading Manual through the Design Review process into development proposals, particularly designated hillside districts; and c) encouraging cluster development

standards and siting guidelines contained in the East Tustin Specific Plan for citywide development concentrating higher intensity development on less sensitive portions of the site and retain greater open space and minimize grading impacts.

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 7.2,7.4, 8.1-8.3, 8.5, 8.6, 8.9, 8.10, 8.12, 8.16, 8.17

34. Preserve Archaeologic and Paleontologic Resources: Preserve archaeologic and paleontologic resources within the City by: a) requiring developers to perform archaeological and paleontological surveys prior to grading in areas known or suspected to contain such resources; and b) enforcing provisions of the California Environmental Quality Act regarding preservation or salvage of significant historic, archaeological and paleontological sites discovered during construction activities.

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 8.6, 8.7, 8.9, 8.15, 8.17,12.1, 12.2, 13.1, 13.2

MANAGED RESOURCES

35. Permit Managed Agricultural Production: Permit managed agricultural production by: a) considering amendments to the Zoning Ordinance permitting agricultural uses as an interim use and reviewing current zoning regulations for needed revisions to protect existing agricultural lands; b) coordinating the construction of public infrastructure improvements to minimize impacts to agricultural operations; and c) using the design review

process to encourage site design and the use of man-made or natural buffers to lessen visual or odor impacts.

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 9.1, 9.2

36. Acquire Important Land Resources: Identify important land resources in the City and pursue State and Federal grants and programs which would fund acquisition of such lands.

Responsible Agency: Community Development

Funding Source: State and Federal Grants

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 7.1, 7.2, 8.7, 12.1, 12.2, 14.4

HISTORIC RESOURCES

37. Preserve Historic Resources: Seek to preserve historic resources by: a) pursuing historic survey and research opportunities as a Certified Local Government with assistance of the State Office of Historic Preservation; b) pursuing historic designation opportunities for new or existing historic and cultural resources utilizing the guidelines established by the National Register, Office of Historic Preservation and the Tustin City Code; and c) continuing to enforce zoning ordinance provisions for the Cultural Resources District and ensuring that design and development standards are enforced.

Responsible Agency: Community Development

Funding Source: City General Fund/State and Federal Funding

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 12.1-12.3

38. Historic District Expansion: Study the expansion or creation of an historic district north of First Street.

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: As City Council assigns

Related C/OS/Recreation Element Policies: 12.1-12.3

SCENIC RESOURCES

39. Protect Scenic Views and Resources: Through the Hillside Review process, monitor and limit development of Peters Canyon Ridgeline consistent with the requirements of the East Tustin Specific Plan, Grading and Excavation Code and Grading Manual.

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 6.1, 8.1, 8.6, 8.12, 8.15-8.17, 14.9

SOLID WASTE

The City of Tustin has prepared a Source Reduction and Recycling element for its portion of the Orange County Integrated Waste Management Plan (IWMP). The element is designed to divert 25 percent of all solid waste from landfills or transformation facilities by January 1, 1995, and 50 percent of solid waste by January 1, 2000.

40. Source Reduction and Recycling: Implement the City's adopted Source Reduction and Recycling element of the IWMP by: a) supporting State action to create state-wide source reduction incentives such as the adoption of advance disposal fees; b) establish a government waste reduction and procurement program; c) investigate the cost effectiveness and feasibility of implementing backyard composting to promote home management of yard waste; d) develop an awards program to recognize significant local integrated waste management achievements; e) develop an educational and technical assistance program; f) develop an annual media campaign and ongoing promotion including the provision of "how to" materials to at least 75 percent of the City's households, businesses, and government employees by 1995, and 90 percent by 2000; g) developing educational materials for a technical assistance program targeting commercial and industrial generators to at least 25 percent of Tustin businesses by 1995, and 50 percent by 2000; h) implementing a recycling program that includes 40 percent of all supermarkets and grocery stores in the City by 1995, and 80 percent by 2000; i) encouraging the development of local and regional markets for all materials recovered through the private sector and all implemented recycling programs on an ongoing basis; and j) Supporting the public sector purchasing and procurement practices for recyclable content products on an ongoing basis.

Responsible Agency: Public Works

Funding Source: City General Fund/Franchise Fees/Solid Waste Charges

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 4.2, 10.1-10.5

RECREATION FACILITIES

41. Identify and Obtain Adequate Local Parklands: Identify and obtain adequate local parklands by: a) encouraging innovative development site designs that include recreation or open space amenities and identifying undevelopable areas for open space during the design review process; b) continuing to enforce Quimby Act Ordinance provisions for residential

development; c) regularly monitoring the condition of designated private open space areas in the City to ensure that zoning and land use permit conditions are met, and that such areas are maintained and not converted to other uses; d) identifying potential sites in the southwest area of the City that may be suitable for parkland or recreation facilities; e) evaluating and updating the City's Master Plan of Parks and Recreation Facilities and the Parkland Dedication Ordinance to ensure the preservation and expansion of open space; and f) revising the parkland in lieu fee schedule as necessary to reflect the current market prices of land.

Responsible Agency: Community Services

Funding Source: City General Fund/Redevelopment/Private Funding/State and Federal Funding

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 4.8, 7.2, 8.11, 8.12, 8.14, 14.1, 14.2, 14.4, 14.5, 14.9, 14.11-14.13, 14.4, 14.7, 14.8, 14.12, 16.2, 16.4, 17.4, 18.6

42. Joint-Use Agreements with Schools: Through joint-use agreements, enhance the use of school facilities by: a) exploring with the Tustin Unified School District, the provision of programs in areas lacking recreation facilities by using schools or private facilities; b) maintaining contact with and input from the School District during the design of any new public facilities; and c) develop a program for joint use of School District properties and surplus school sites.

Responsible Agency: Community Services

Funding Source: City General Fund/Tustin Unified School District

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 14.5, 14.6-14.8, 16.6, 16.10, 18.4, 18.7

43. Joint-Use Agreements with Orange County Flood Control: Explore the feasibility of utilizing County Flood Control facilities for recreational trails.

Responsible Agency: Community Services/Public Works

Funding Source: City General Fund/OCFC

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 7.1, 7.5, 14.3, 17.5

44. Community Services Coordination: Coordinate with other community service providers on a regular basis to ensure that programs and services are not being duplicated or competing against each other in the City.

Responsible Agency: Community Services

Funding Source: City General Fund

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 15.2, 16.5, 16.9, 18.7

45. After-School and Other School-Associated Programs: Coordinate after-school and other non-school hour programs with the Tustin Unified School District by: a) evaluating the need for after-school and other non-school hour day care programs for elementary age children and supporting programs as needed; and b) coordinating and supporting development low cost after-school programs such as sports leagues and clinics for middle school age children.

Responsible Agency: Community Services/TUSD

Funding Source: City General Fund/TUSD/Private Sources/State and Federal Funding

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 14.1, 14.5, 16.4, 16.10, 16.11, 18.4

46. Integrated Open Space System: Prepare an integrated open space plan for the City that includes: a) the City's parklands, landscaped medians and parkways in City streets, bicycle and pedestrian trail systems, and active and passive open space; b) phasing schedules for commitment of resources including the design and construction of facilities; and c) using the Design Review process to ensure installation of trail systems and other complementary facilities, and the connection of private open space with the comprehensive system of public open space.

Responsible Agency: Community Development/Community Services/ Public Works

Funding Source: City General Fund/Private Funding/State and Federal Funding

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 7.6, 8.9, 8.11, 8.14, 14.4, 14.13, 16.2, 17.5, 18.6

47. Accessibility Plan: Design new and renovate existing parks for convenient and accessible use and provide that all recreation programs, services and facilities are accessible to the disabled in accordance with the Americans with Disabilities Act.

Responsible Agency: Community Services

Funding Source: City General Fund/Redevelopment/Private Funding/State and Federal Funding

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 14.1, 14.2, 16.4

48. Recreational Needs Awareness: Inform the public of recreational facilities and opportunities, and receive public input on such services by: a) providing program and service information through Tustin Today and handouts at City Hall and

incorporated in the design during the plan check process; and c) explore the utilization of private maintenance where appropriate to reduce public cost.

Responsible Agency: Community Services/Public Works/Private Providers

Funding Source: City General Fund/Private Funding Sources

Time Frame: Ongoing

Related C/OS/Recreation Element Policies: 14.9, 16.5, 17.1-17.4

TUSTIN

GENERAL PLAN

Public Safety Element

T U S T I N
GENERAL PLAN

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INTRODUCTION TO THE PUBLIC SAFETY ELEMENT

The urban environment contains many natural and man-made hazards which require special consideration and treatment in the land use planning process. The purpose of the Public Safety Element is to identify these hazards and to establish appropriate policy to minimize the exposure of Tustin residents to such hazards. An emphasis is placed on tying land use decisions to public safety concerns. The Public Safety Element also stresses the importance of emergency preparedness in reducing community disruption in the event of a disaster.

PURPOSE OF THE PUBLIC SAFETY ELEMENT

The purpose of the Public Safety Element is to identify and address those natural or man-made characteristics which exist in or near the City which represent a potential danger to the safety of the citizens, sites, structures, public facilities, and infrastructure. The Element establishes policies to minimize the danger to residents, workers, and visitors; and identifies actions needed to deal with crisis situations. The manner in which emergency response agencies cooperate with one another and with other jurisdictions is a key component of the element.

Issues Overview

The Public Safety Element is a State-mandated component of a General Plan. Government Code section 65302(g) sets forth a list of hazards or public safety issues that the Element must cover if they pertain to the City. For the City of Tustin, the applicable hazards are:

- Flooding;
- Seismically induced conditions, including surface rupture, ground shaking, ground failure, and seiche;
- Slope instability leading to mudslides and landslides;
- Subsidence and other geologic hazards;

- Wildland/urban interface fires; and
- Evacuation routes.

State law also permits cities to add safety issues to this list and to delete issues which are not pertinent. Potential safety issues were researched and documented for preparation of the Public Safety Technical Memorandum that was completed as a background document for the General Plan. The following public safety issues were added to those mentioned above:

- Hazardous materials;
- Law enforcement; and
- Aircraft overflights.

RELATED PLANS AND PROGRAMS

The Public Safety Element issues relate closely to certain issues discussed in the Land Use and Conservation/Open Space/Recreation Elements of the General Plan. Tustin is updating its Emergency Preparedness Plan that addresses several hazard areas including seismic, flooding, and hazardous materials. This Emergency Preparedness Plan will be reviewed by State and Federal agencies which have their own roles in the event of an emergency, including the Federal Emergency Management Agency (FEMA), the State Office of Emergency Services (OES), and the California Highway Patrol (CHP).

SCOPE AND CONTENT OF THE ELEMENT

This Element is composed of three major sections: Summary of Public Safety Issues, Needs, Opportunities, and Constraints; Public Safety Goals and Policies; and The Public Safety Plan. The Public Safety Issues, Needs, Opportunities, and Constraints section establishes the basis for formulation and expression of the City goals and policies related to public safety. The Public Safety Goals and Policies section establishes public safety objectives and a decision-making framework for City leaders in evaluating issues for their safety impact. The Public Safety Plan

provides more detailed approaches to hazard mitigation and ensures adequate emergency response to identified hazards.

The Public Safety Plan is based upon the Element's goals and policies, and relies on the detailed description of local hazards from the Public Safety Technical Memorandum.

RELATIONSHIP TO OTHER GENERAL PLAN ELEMENTS

As one element of the General Plan, the Public Safety Element must be consistent with other General Plan Elements. All elements of the Plan are interrelated to a degree, and certain goals and policies of each element may also address issues that are the primary subjects of other elements. The Public Safety Element relates most closely to the Circulation and Noise Elements. The Circulation Element relates to the Public Safety Element by establishing safe road widths, accessibility standards for firefighting equipment, and emergency evacuation routes. The Noise Element relates to the Public Safety Element by establishing standards for safe levels of noise.

The other Elements of the General Plan relate to the Public Safety Element by supporting the Public Safety Element. The Land Use and Conservation/Open Space/Recreation Elements address public safety issues by designating lands with unstable or hazardous characteristics, and the Housing Element promotes safe housing for City residents. Taken as a whole, all the elements contribute to the promotion of a safer environment for Tustin inhabitants.

SUMMARY OF PUBLIC SAFETY ISSUES, NEEDS, OPPORTUNITIES, AND CONSTRAINTS

The Tustin Planning Area is affected by many issues, opportunities, and constraints that affect public safety. The following section summarizes these and establishes a basis for future goals and policies.

FLOODING

- The Planning Area contains creeks and washes which create potential flooding problems.
- Eastern parts of the City are subject to flooding in a 100-year storm, and most of the southern and eastern areas of the City are subject to flooding in a 500-year storm; however, no significant flooding has occurred in the last decade.
- The City has applied to the Federal Emergency Management Agency for modification of the Flood Insurance Rate Maps; the application is pending.
- The Santiago and Villa Park Reservoirs could inundate parts of the Planning Area if their dams failed.

SEISMIC HAZARDS

- The Tustin Planning Area lies within a seismically active region.
- No known active or suspected potentially active faults exist within the Planning Area. The El Modena fault passes through the Planning Area's northern section; however, studies have not been conclusive about the active/inactive status of this fault.
- Several major faults lie within 10 to 45 miles of the Planning Area.

- Potential hazards include ground shaking, liquefaction, unreinforced masonry structural hazards, and tilt-up concrete buildings constructed prior to 1974.

HAZARDOUS AND TOXIC MATERIALS

- Risks to individuals and the community would occur in the event of accidental release or combustion of hazardous materials.
- High pressure pipelines which carry petroleum and fuels pass through the City.

FIRE

- The Tustin Planning Area is subject to both urban and wildland fire hazards which result from a number of causes, including arson, carelessness, home or industrial accidents, or from ignorance of proper procedures for home or business repairs.
- The northeast part of the Planning Area is most susceptible to wildland fires while the southwest area is most susceptible to urban fires.
- Low water pressure affects the Old Town and Cowan Heights areas.

CRIME/LAW ENFORCEMENT

- Efforts have been focused on keeping crime activity to a minimum. While calls for police assistance rose 24 percent over the past five years, arrests have increased by 168 percent.

AIRCRAFT OVERFLIGHTS

- The City lies under the Instrument Landing System Corridor of John Wayne International Airport and the Browning Corridor of MCAS Tustin, the primary aircraft approaches to the respective airfields.
- The Planning Area does not lie within any of John Wayne's safety zones and only a very small area of an MCAS hazard potential zone affects an off-base area. However, aircraft overflights do present the potential for inflight accidents over Tustin.

EMERGENCY PREPAREDNESS PLANNING/DISASTER RESPONSE

The City's Emergency Operations Plan has been completed, but will undergo a continual "update" as training and exercises will identify areas of weakness.

PUBLIC SAFETY ELEMENT GOALS AND POLICIES

This section of the Public Safety Element sets forth Tustin's goals and policies for dealing with safety issues. The policies provide direction for approaches to public safety that are described in the Public Safety Plan.

FLOODING

Minimizing the risk of flooding within the community can be accomplished by proper planning and actions related to new development and redevelopment of land.

GOAL 1: Reduce the risk to the community's inhabitants from flood hazards.

Policy 1.1: Identify flood hazard areas and provide appropriate land use regulations for areas subject to flooding.

Policy 1.2: Coordinate with the appropriate agencies to assure that existing bridges are constructed according to accepted standards to avoid damage by flooding.

Policy 1.3: Continue to participate in the national flood insurance program.

Policy 1.4: Cooperate with the Orange County Flood Control District to plan for and make needed improvements or modifications to Peters Canyon Channel to enable it to carry runoff from a 100-year storm.

Policy 1.5: Require detention basins as a flood control measure where applicable to reduce the risk from flood hazards.

Policy 1.6: Design future development located near water storage facilities to minimize damage caused by leak, rupture, or flooding from a water storage facility.

Policy 1.7: Encourage the Orange County Flood Control District to maintain scheduled debris removal from flood channels.

GOAL 2: Minimize risk from upstream dam failures.

Policy 2.1: Provide the public with information regarding emergency preparedness in event of dam failure.

Policy 2.2: Work with other responsible agencies to ensure and improve the safety of the Santiago and Villa Park Reservoirs.

SEISMIC HAZARDS

Geologic and seismic hazards can be reduced to avoid unnecessary risk. Appropriate planning and preparedness actions will minimize exposure to these hazards.

GOAL 3: Reduce the risk to the community from geologic and seismic hazards.

Policy 3.1: Require review of soil and geologic conditions by a State-Licensed Engineering Geologist to determine stability prior to the approval of development where appropriate.

Policy 3.2: Maintain and regularly update all seismic and geologic information regarding safety, and ensure the consistency of that information with other affected agencies.

Policy 3.3: Encourage development which utilizes the desirable existing features of land such as natural vegetation, geologic features, and other natural features which preserve the site's significant identity.

Policy 3.4: Regulate the structural seismic safety of all buildings located within the City, especially unreinforced masonry buildings built prior to 1933. Inventory tilt-up industrial buildings built prior to 1974.

Policy 3.5: Ensure that structures for human occupancy, critical structures, and vital emergency facilities are designed to minimize damage from potential geologic/seismic hazards and avoid functional impairment.

Policy 3.6: Promote earthquake preparedness within the community by participation in periodic earthquake awareness programs.

Policy 3.7: Include and periodically review and update emergency procedures for earthquakes in the City's Emergency Preparedness Plan.

Policy 3.8: Coordinate with County of Orange, Atchison Topeka and Santa Fe Railroad, and Caltrans to identify and correct any structural deficiencies of bridges and overpasses that traverse the City of Tustin.

Policy 3.9: Where geologic instability or presence of faulting is discerned, use appropriate open space mechanisms and or regulate development in accordance with State law and consistent with the levels of acceptable risk.

HAZARDOUS AND TOXIC MATERIALS

Exposure to hazardous and toxic materials can be avoided through proper planning and policy aimed at reducing the risk associated with use, transport and disposal of such materials.

GOAL 4: Reduce the risk to the community's inhabitants from exposure to hazardous materials and wastes.

Policy 4.1: Cooperate with the County to implement applicable portions of the County's proposed Hazardous Waste Management Plan when it is approved by the State.

Policy 4.2: Cooperate with railroad operations to ensure that hazardous materials transported by rail do not pose a threat to life or property.

Policy 4.3: Transportation of hazardous waste will be minimized and regulated where possible to avoid environmentally sensitive areas and populated, congested, and dangerous routes.

Policy 4.4: Cooperate fully with other local, State, and federal agencies to efficiently regulate the management of hazardous material and hazardous waste.

Policy 4.5: Establish regulations requiring land uses involved in the production, storage, transportation, handling, or disposal of hazardous materials to be located a safe distance from other land uses that may be adversely affected by such activities.

Policy 4.6: Place public participation as a high priority throughout the process of siting hazardous waste facility projects.

Policy 4.7: Establish defined transportation routes for the conveyance of hazardous materials.

Policy 4.8: Adopt a Hazardous Household Waste Plan, and encourage and support the proper disposal of hazardous household waste and waste oil.

Policy 4.9: Cooperate with responsible agencies to ensure that dry cleaners, film processors, auto service establishments and other service businesses generating hazardous waste materials are complying with approved disposal procedures.

Policy 4.10: Regulations governing the discharge of hazardous waste into sewer systems will be strictly enforced.

Policy 4.11: Minimize the amount and toxicity of hazardous waste and materials generated in Tustin by encouraging recycling, source reduction technologies and educational assistance to local residents and commercial and industrial handlers.

Policy 4.12: Sponsor regular household hazardous waste disposal programs to enable residents to bring back yard pesticides, cleaning fluids, paint cans, and other common household toxics to a centralized collection center for proper disposal.

Policy 4.13: Support efforts to enforce State "right to know" laws, which outline the public's right to information about local toxics producers.

Policy 4.14: Establish development standards for storage of industrial chemicals and other potentially hazardous substances.

Policy 4.15: Coordinate with the County of Orange in the implementation of the National Pollution Discharge Elimination System Permits (NPDES) regulations.

Policy 4.16: Continue to identify and target community audiences to inform them of the availability and convenience of permanent Household Hazardous Waste collection sites.

FIRE

Fire hazard potential exists where water pressure is efficient and where large areas of dry vegetation occur. The potential for this hazard can be reduced through appropriate regulation, education, and cooperative measures.

GOAL 5: Reduce the risk to the community's inhabitants from fires or explosions.

Policy 5.1: Work closely with the County of Orange or any future Fire District to continue to operate an education program regarding fire hazards.

Policy 5.2: Encourage the use of fire retardant roofing materials in high-hazard areas.

Policy 5.3: Establish and maintain mutual aid agreements with surrounding jurisdictions for fire protection.

Policy 5.4: Enforce building code requirements that assure adequate fire protection.

Policy 5.5: Study alternatives for upgrading emergency water line capacities in deficient areas.

Policy 5.6: Cooperate with selective Orange County contract and fire district cities to ensure the provision of adequate and cost-effective fire protection services.

CRIME/LAW ENFORCEMENT

Stabilizing the level of criminal activity in the community as growth occurs is very important in maintaining the overall quality of life in Tustin. This effort involves both law enforcement and citizen involvement to address crime problems.

GOAL 6: Stabilize demand for law enforcement services.

Policy 6.1: Provide appropriate levels of police protection within the community.

Policy 6.2: Periodically evaluate service levels and service

criteria.

Policy 6.3: Pursue State and Federal monies to offset the cost of providing police protection.

Policy 6.4: Cooperate with the Orange County Sheriff's Department and surrounding police departments to provide back-up police assistance in emergency situations.

Policy 6.5: Promote the use of defensible space concepts (site and building lighting, visual observation of open spaces, secured areas, etc.) in project design to enhance public safety.

Policy 6.6: Enhance public awareness and participation in crime prevention by developing new, and expanding existing, educational programs dealing with personal safety awareness, such as neighborhood watch, commercial association programs, and community oriented policing.

AIRCRAFT OVERFLIGHTS

Air operations associated with John Wayne International Airport and MCAS Tustin represent a potential hazard for the community. The risk from this hazard can be minimized through proper planning of land use.

GOAL 7: Minimize the level of danger to life and property from air operations accidents.

Policy 7.1: Develop criteria to regulate the type and intensity of developments in areas of known potential air operations hazards.

Policy 7.2: Coordinate land use planning and emergency preparedness planning with MCAS Tustin and John Wayne Airport officials.

Policy 7.3: Monitor legislation promulgated by the FAA which could eliminate local flight restrictions on John Wayne Airport.

Policy 7.4: Establish criteria for review and siting of heliports and helipads.

Policy 7.5: Encourage Tustin citizen participation and City involvement on committees which would impact future aircraft operations in Orange County.

Policy 7.6: Work to reduce risks and noise impacts resulting from aircraft operations by: (a) opposing permanent future reuse of MCAS, Tustin for Commercial or general aviation air operations; (b) participate in and monitor the planning processes for John Wayne Airport and reuse on MCAS, El Toro; (c) continue to discourage commercial or general aviation activities which increase noise exposure.

EMERGENCY PREPAREDNESS PLANNING/DISASTER RESPONSE

Proper preparation for major emergencies is necessary to minimize disruption, personal injury, and property damage. Preventive measures taken before an emergency occurs can hasten recovery from such incidents.

GOAL 8: Improve the City's ability to respond to natural and man-made emergencies.

Policy 8.1: Maintain an up-to-date Emergency Operations Plan identifying all available resources and funds for use in the event of a disaster and establishing implementing actions or procedures under the Plan for rescue efforts, medical efforts, emergency shelters, provision of supplies, and all other response efforts recommended by the State Office of Emergency Services and the Federal Emergency Management Agency (FEMA). Include procedures for dealing with specific events such as earthquake, major rail and roadway accidents, flooding, and hazardous materials.

Policy 8.2: Coordinate with Orange County and the Federal Emergency Management Agency in reducing community risks in the event of a disaster.

Policy 8.3: Sponsor and support public education programs for emergency preparedness and disaster response; distribute information about emergency planning to community groups, schools, churches, and business associations; and hold emergency drills in various parts of Tustin to test the effectiveness of emergency preparedness plans.

Policy 8.4: Maintain a high level of multi-jurisdictional cooperation and communication for emergency planning and management and solicit participation from private sector sources (i.e., ham radio, cellular telephone, etc.) to enhance local communication and response capability.

GOAL 9: Reduce the amount of personal injury, damage to property, and economic or social dislocation as the result of disaster.

Policy 9.1: Existing vital facilities not designed to be disaster-resistant should be examined, and hazardous structures should be improved or demolished.

Policy 9.2: Vital facilities shall be designed and operated in a manner maximizing their ability to remain functional during and after disaster.

Policy 9.3: Encourage residents and businesses to undertake preventive measures for both catastrophic events and for more frequent incidents; for example, structural fires, localized flooding, and so on.

Policy 9.4: Assist in orderly and efficient reconstruction activities following a disaster to the maximum extent possible.

Policy 9.5: Ensure that people take appropriate and effective action to safeguard life and property during and immediately after emergencies, and assist in returning their lives and businesses to normal to the extent possible.

RELATED GOALS AND POLICIES

Goals and policies contained in the other Elements are also important in addressing public safety issues. The Land Use Element ensures incompatible uses are located away from each other. The Housing Element also contains policies that underscore the importance of ensuring that housing is both safe and decent. The Circulation Element relates to this element by establishing safe road widths, accessibility standards, and emergency routes. The Noise Element relates to this element by establishing standards for safe noise levels. A number of goals and policies contained in the Conservation/Open Space/Recreation Element are concerned with development restrictions in areas subject to environmental constraints that

might affect both persons and property. Other Elements containing policies that serve to support the aims expressed in this Element are identified in Table PS-1.

**TABLE PS-1
PUBLIC SAFETY RELATED
GOALS AND POLICIES BY ELEMENT**

Public Safety Issue Area	Related Goals and Policies by Element						
	Land Use	Housing	Circulation	Noise	Public Safety	Conservation/ Open Space/ Recreation	Growth Management
Flood Hazards	8.5					7.5, 8.4	
Seismic Hazards						8.8	
Hazardous and Toxic Materials	4.5					5.7, 10.1	
Fire Hazards							
Emergency Preparedness Plan							
Crime/Law Enforcement							
Aircraft Overflights	2.6		3.6	1.3, 1.4, 1.5, 1.6			

THE PUBLIC SAFETY PLAN

The Public Safety Plan describes the approach to be used in implementing the Public Safety Element goals and policies. The goals and policies of the Element provide direction for specific actions by the City. How Tustin achieves those goals and implements those policies is determined by programs, actions, and cooperative efforts sponsored or participated in by the City.

FLOODING

As indicated in the Summary of Issues, Needs, Opportunities, and Constraints, flooding can potentially occur throughout the Planning Area. The Planning Area contains many creeks and washes; however, few parts of the Planning Area have been identified as areas within a 100-year storm flood area. Areas that have been so designated have not flooded within the last 10 years and are less susceptible to flooding due to more recent storm drain and flood control improvements.

As new development occurs, the City has and will continue to improve or require the improvement of flood control facilities. These flood control improvements will be coordinated with Circulation Element roadway construction projects to ensure that major thoroughfares in the City are useable during 100-year storm conditions. Improvement of the Peters Canyon Channel so that runoff from a 100-year storm can be carried represents an important flood control project requiring the joint efforts of the City and the Orange County Flood Control District. Flood control will also be improved through the use of detention basins in appropriate areas. Future development in areas near public water storage reservoirs will be designed so that any damage that might result from leaks or ruptures to storage facilities is minimized. Additionally, the City has applied to the Federal Emergency Management Agency for revision of the Flood Insurance Rate Maps.

The risk of flooding resulting from dam breaches or failures will be reduced by working directly with the State Office of Emergency Services to make physical improvements (if necessary) and monitor the safety of the Santiago and Villa Park Reservoirs. The potential for loss of life associated with dam

breaches or failures will be reduced by periodically disseminating information describing emergency preparedness methods and procedures useful to City inhabitants.

SEISMIC HAZARDS

Groundshaking, liquefaction, unreinforced masonry structures, and older tilt-up concrete structures represent the main seismic dangers within the Planning Area. The City requires the retrofitting of unreinforced masonry structures. The City also anticipates inventorying tilt-up concrete structures built prior to 1974. When the inventory is complete, the City will encourage the owners of such structures to retrofit them.

Since the primary seismic danger in Tustin is groundshaking, the City cannot directly mitigate this hazard. Earthquakes and groundshaking in Southern California are unavoidable. However, the City will require that housing and other structures be designed to be as shock resistant as possible or feasible. Of particular importance are those structures designed for human occupancy, critical service structures, and vital emergency facilities which are essential during periods of emergency. Earthquake awareness programs will be periodically promoted by the City stressing individual preparedness and understanding of community-wide procedures.

The City will require geologic investigations for all development. Means of siting or constructing a building which will render it more resistant to groundshaking will be balanced against competing City goals, and will be encouraged or required if necessary for public safety. Development within areas shown to be unsafe in light of the geologic investigation will be restricted and mitigated to ensure reasonable safety. Should structural deficiencies of critical public facilities such as bridges and overpasses be identified, the City will work directly with Caltrans, the County of Orange, the AT & SF Railroad, and other responsible agencies to correct such deficiencies.

HAZARDOUS AND TOXIC MATERIALS

Hazardous and toxic materials which would present the greatest threat in Tustin include those transported through the Planning

Area, either on the freeways or railroads, or in the pipelines travelling underground. With recommendations from other responsible agencies, the City will identify specific transportation routes and procedures for conveying hazardous materials to minimize risk to inhabitants.

The main regulatory means of controlling hazardous materials are City regulations governing the siting of and conditions imposed upon facilities which handle hazardous materials. The County Hazardous Waste Management Plan is a document which will also contribute to the control of such facilities. The County prepared the Plan which was approved by the State on October 30, 1991. Subsequently, the City adopted their final Hazardous Waste Facilities Ordinance. The City has also adopted a Household Hazardous Waste Element which includes educational programs that inform the public of their responsibilities and appropriate techniques to protect the environment, such as recycling and source reduction.

State law requires cities to: 1) adopt a plan or 2) refer to County Plan in the City's General Plan, or 3) enact an ordinance to prepare plans and policies for regulating hazardous wastes, including siting and planning for hazardous waste facilities. The City through their Hazardous Waste Facilities Ordinance has established siting criteria for hazardous waste treatment, transfer, and disposal sites. The criteria will be used to review all proposals for such facilities within Tustin. A general description of the City's siting factors, objectives, and criteria is presented in Table PS-2.

Management of hazardous materials will include the establishment of safe distances separating land uses that produce, store, transport, handle, or dispose of such materials from other uses. The City also supports the efforts of other agencies responsible for regulating the use of hazardous materials. In particular, the County of Orange will be supported in its efforts to implement the National Pollution Discharge Elimination System Permits (NPDES) regulations.

**TABLE PS-2
CITY OF TUSTIN
HAZARDOUS WASTE FACILITIES SITING FACTORS**

OBJECTIVE	SITING CRITERIA
1. Protect residents	◦ Minimum distance of 2,000 feet between residences and active part of any residual repository facility. ◦ Consider proximity to immobile populations and sensitive uses, such as schools and hospitals.
2. Ensure the structural stability and safety of the facility	◦ Facility must comply with Building and Fire Codes and Zoning setback requirements for Industrial and Planned Community Industrial Districts unless greater setbacks are justified pursuant to risk assessment. Facilities shall be located in areas where: ◦ Immediate response to hazardous materials accident is available from Fire Department. ◦ Mutual aid and immediate aid agreements are well established. ◦ Demonstrated emergency response times are the same or better than those recommended by OCFD. Emergency Services Plan shall be transmitted to OCFD who shall determine adequacy of emergency response time. Avoid locating facility near: ◦ 100 year flood zones and flash flood and debris flow areas; ◦ Dam failure inundation areas; and ◦ Active faults (minimum distance of 200 feet). Prohibit residuals repositories and require engineered design safety features for other facilities in areas of potential: ◦ Slope instability (unstable soils); and ◦ Subsidence/liquefaction.

TABLE PS-2
CITY OF TUSTIN
HAZARDOUS WASTE MANAGEMENT SITING FACTORS
(Continued)

OBJECTIVE	SITING CRITERIA
3. Protect surface and ground water resources	◦ Avoid locations near aqueducts and reservoirs. ◦ Proximity to supply wells and well fields should be outside the cone of depression created by pumping a well or well field for 90 days. ◦ Residual repositories and facilities with underground storage prohibited in areas hazardous materials will be below the tension-saturated zone. ◦ All facilities must be capable of withstanding hydraulic pressure gradients to prevent failure due to settlement, compression, or uplift as certified by a California Registered Civil Engineer or Geologist. ◦ Facilities handling liquid must locate where groundwater flow is in one direction with no vertical transfer of water. ◦ Residuals repositories and facilities with subsurface storage or treatment must develop a program that successfully satisfies the Regional Water Quality Control Board permit requirements for groundwater monitoring. ◦ Soil Permeability requirements shall conform to State Water Resources Control Board. ◦ Residuals repositories permitted only where uppermost water-bearing zone or aquifer is presently mineralized to extent it cannot be considered for beneficial use. ◦ Locate in areas with adequate sewer capacity.
4. Protect air quality	◦ Facilities in Prevention of Significant Deterioration air quality areas required to submit preconstruction review and apply best available control technology. ◦ Facilities with air emissions require preconstruction review and permits from SCAQMD.

**TABLE PS-2
CITY OF TUSTIN
HAZARDOUS WASTE MANAGEMENT SITING FACTORS
(Continued)**

OBJECTIVE	SITING CRITERIA
5. Protect environmentally sensitive areas	Prohibit facility location in: ◦ Wetlands; ◦ Proximity to habitats of threatened and endangered species; ◦ Recreational, cultural, and aesthetic resource areas. Permitted on case-by-case basis: ◦ Federal and State lands. ◦ Consider proximity to areas of waste generation (waste generation stream). ◦ Locate close distance to waste generation source, except for residuals repositories.
6. Ensure safe transportation of hazardous waste	◦ Road networks should not utilize local residential streets. ◦ Follow highways with low to average AADT and accident rates. ◦ Consider capacity vs. AADT of access route.
7. Protect social and economic development goals of the community	◦ Facilities must locate in industrial zoned lands. ◦ Potential changes in real property values require independent study. ◦ Potential changes in employment require independent study. ◦ Facility shall comply with all General Plan, Zoning Ordinance, and other planning requirements.

Source: City of Tustin
Abbreviations: AADT = Average Annual Daily Traffic

FIRE HAZARDS

Two main problems contribute to fire hazards in Tustin, low water pressure and large areas of dry vegetation. The primary program to improve fire protection will be to upgrade water lines in areas where pressure is deficient. Acceptable water pressure and fire department response time standards are shown in Table PS-3.

Fire protection will also be improved by establishing and maintaining mutual aid agreements with surrounding jurisdictions. A primary means of improving fire prevention will be the requirement of construction materials that are either specifically fire resistant or of low fuel value.

Education also plays an important role in fire safety. Particularly in wildland interface areas, people must be made aware of the fire danger in natural and open space areas, particularly in the fire season. Education programs will be sponsored in cooperation with the local fire department.

CRIME/LAW ENFORCEMENT

As urban development progresses through Orange County, parts of Tustin become more susceptible to crime. Efforts to reduce crime have met with some success. Even though crime has increased, a higher percentage of reported crimes are now resulting in arrest. Reducing crime effectively is a time and labor intensive effort. The City will do everything possible to increase service levels and acquire funding to do so. Table PS-3 shows Police Department standards for responding to calls.

Public awareness is also vital in the fight against crime. The City will encourage an activated citizenry to "take ownership" of their streets, report crimes, and be a visible presence. One such program is Neighborhood Watch and community oriented policing. The City will also work with the citizens in creating a force of volunteers. Such a program has been proven effective in some other Southern California cities.

**TABLE PS-3
EMERGENCY SERVICES STANDARDS**

FIRE RESPONSE	First Engine Company:	5 minutes to 90% of incidents
EMERGENCY MEDICAL	Basic Life Support Unit:	5 minutes to 90% of incidents
	Advance Life Support Unit:	10 minutes to 90% of incidents
POLICE RESPONSE	Emergency calls:	3.5 minutes
	Non-emergency calls:	13 minutes

Another method that the City can use in the fight against crime is to ensure that new construction is designed in a way that discourages gang activity and other aggressive lawless behavior. Some examples of "protective architecture" or defensible space are well lit entryways, lack of convenient hiding places, entryways which are easily seen from the street, and other similar concepts.

AIRCRAFT OVERFLIGHT HAZARDS

Large parts of Tustin's residential areas lie underneath flightpaths of both MCAS Tustin and John Wayne International Airport. While the City's power to limit the operational activities of these facilities is extremely limited, the City can participate in land use control within the flight paths and the legislative process which regulates civilian and military air operations. This includes coordinating land use planning and emergency preparedness planning with the County's Airport Land Use Commission, John Wayne Airport, and MCAS Tustin officials. All development proposals affected by the airport land use commission consistency criteria are referred to the Airport Land Use Commission (ALUC). The ALUC reviews areas within the 60 dB CNEL contour, areas within the Clear or Accident Potential Zones, areas with Building Height restrictions, or within specified distances from runway surfaces. As with most controversial safety related topics, the involvement of citizens is of great importance. The City will encourage and

notify residents of opportunities to become involved in airport related issues.

AGENCY RESPONSIBILITIES AND COORDINATION

The City contracts with the Orange County Fire Department for Fire and Paramedic Services. Other agencies which have jurisdiction or which provide public safety services within Tustin include the California Highway Patrol, and the Orange County Health Department. The City coordinates with these agencies to provide the highest level of public safety services.

The City will continue to work with these agencies to ensure adequate service. Plans for proposed developments, including City projects, will be sent to appropriate agencies for their review and comment. This will occur whether or not an environmental impact report is prepared. An integral part of the updated Emergency Operations Plan will be the explanation of the appropriate responses and responsibilities of individual agencies and the interagency coordination required to implement emergency procedures.

The Southern California Earthquake Preparedness Project (SCEPP) is a State and federally-funded effort to encourage local jurisdictions to prepare for catastrophic earthquakes that may occur in Southern California. SCEPP recommendations have also been approved by the Orange County Board of Supervisors. SCEPP works directly with local governments, private industry, and volunteer groups in a cooperative planning effort. It addresses the full range of earthquake strategies, including mitigation (long term response), prediction (short term response), emergency actions, and recovery.

EMERGENCY RESPONSE AND ACTION

This section of the Public Safety Element discusses emergency preparedness planning needed to respond to major disasters. With Tustin's recently updated Emergency Operations Plan, the reader or user of this Element is able to review that document in conjunction with the material contained here. The Emergency Operations Plan is meant to be a preparedness

document, designed to be read before a disaster, not in response to one.

Each city must have a plan for response to emergency and disaster situations. The City of Tustin has recently updated its Emergency Operations Plan. The updated plan establishes response procedures for peace and wartime disasters. The Plan conforms to the provisions of the California Emergency Preparedness Plan and Emergency Resources Management Plan which apply to city governments.

Emergency Evacuation

The City's Emergency Operations Plan identifies routes through the City which are suitable for use as evacuation routes. The extent and severity of a disaster will determine which routes and which directions people may take in order to escape the afflicted areas. Figure PS-1 shows the City's emergency evacuation routes.

Emergency Response Personnel

First response will be provided by the City Police Department, County Fire Department and Public Works Department who bear most of the responsibility for providing emergency services. In addition to the above agencies, in the event of a major disaster, other City, County, and State personnel assume local emergency response roles.

The updated Emergency Operations Plan will detail these roles and responsibilities. Table PS-4 shows which agencies are responsible for various tasks in emergency situations.

Emergency Shelters

In the event of either a natural or man-made disaster, homes may be destroyed or be inaccessible for extended periods of time. Area residents will need some form of temporary shelter. The American Red Cross bears primary responsibility for providing emergency shelter to displaced residents. The Red Cross maintains an inventory of sites suitable for use as emergency shelters. The site or sites used in a particular emergency depend upon the scope and scale of the emergency and the length of time required to shelter the refugees. Sites

Table PS-4 Emergency Responsibilities

ANNEX/FUNCTION

	Management	A Alerting and Warning	Communications	Situation Analysis	B Fire and Rescue	C Law Enforcement	Access Control	D Medical	E Public Health	F Coroner	G Care and Shelter	H Movement	I Rescue	J Const. & Engineering	Supply/ Procurement	K Personnel	Transportation	Utilities	L Public Information	M Recovery	R Radiological Protection
City Manager	P			S																S	
Assistant City Manager	S																		P	S	
City Attorney	S																			S	
Adm./Comm. Services											P				S	P	P			S	
Community Development				P							S			S		S				S	
Finance															P	S				P	
Orange County Fire Dept.		S	S	S	P			P		S			P						S	S	P
Orange County Health Care Agency								S	S											S	S
Orange County Sheriff						S		S		S										S	
Police Department		P	P	S	S	P	P	S		P		P	S			S			S	S	
Public Works		S	S	P	S		S		P			S		P		S	S	P		S	
Red Cross									S		S					S				S	
Tustin Unified School District											S									S	

NOTE: *P - City department responsible until county/contractor arrives
P - Principle agency/organization responsible
S - Supporting agency/organization

most frequently used for shelter are schools, senior centers, community centers, public buildings, and churches. In the event of a disaster, the City will activate their Care and Shelter operations and provide food, clothing, shelter and other basic necessities of life, and continue to cooperate with the Red Cross to make City owned facilities available as emergency shelters.

PUBLIC SAFETY ELEMENT IMPLEMENTATION PROGRAM

The Public Safety Element Implementation Program provides a guide to the community, City staff, and City officials in daily decision-making by suggesting methods to implement adopted policy. Implementation measures for this Element are intended to address natural and man-made conditions which represent potential dangers or safety hazards to the City's properties and inhabitants. The Implementation Program is a series of actions, procedures, and techniques that are designed to apply the overall policy direction contained in the Element. By incorporating the Implementation Program with the General Plan, the City Council recognizes the importance of long-range planning considerations in day-to-day decision-making, subject to funding constraints.

CONTROL OF LAND USES

- 1. Land Use Controls:** Implement the following land use regulations to control development in areas that are subject to hazardous conditions.
 - a. Continue to regulate roofing materials in high potential fire hazard areas to reduce fire impacts;
 - b. Recommend fuel modification plant materials in high potential fire hazard areas;
 - c. Enforce provisions of the City's Grading Manual requiring geological and/or engineering reports in areas where geological hazard conditions may exist;
 - d. Enforce provisions of the City's Hazardous Waste Facilities Ordinance to regulate and control the location and operation of facilities and guarantee public participation through a public hearing process;
 - e. Coordinate with the Airport Land Use Commission to protect and prevent the construction of sensitive and residential land uses under air traffic corridors in order to reduce the potential accidents affecting highly populated areas; and

- f. Regulate new construction within floodplain areas through the City's Floodplain Management Ordinance, making modifications as necessary to the Ordinance to reflect FEMA information.
- g. Reduce public safety risks resulting from aircraft operations by (1) opposing permanent future reuse of MCAS, Tustin for Commercial or general aviation air operations; (2) participating and monitoring the planning processes for John Wayne Airport and reuse of MCAS, El Toro by continuing to monitor proposed activities, expansions or alterations or use and responding to environmental documents for related projects.

Responsible Agency: County of Orange/Community Development

Funding Source: Variety of sources

Time Frame: Ongoing

Related Public Safety Element Policies: 1.1, 7.1

FLOODING

2. Flood Control Facilities: Flood control improvements and maintenance will be monitored where necessary, and such improvements and maintenance will be coordinated with the Circulation Element, Orange County Flood Control District, State Water Resources Board, Regional Water Quality Control Board, Department of Fish and Game, and Army Corps of Engineers. The City has applied to the Federal Emergency Management Agency for the revision of Flood Insurance Rate Maps to reflect flood control facility improvements.

Responsible Agency: Public Works

Funding Source: City General Fund/Orange County Flood Control District

Time Frame: Ongoing

Related Public Safety Element Policies: 1.2-1.6, 2.2

3. Water Storage Facilities: Perform regular inspections of all City of Tustin water facilities and implement procedures to ensure safety of these facilities, and encourage IRWD to implement similar procedures.

Responsible Agency: City of Tustin Water Division, Public Works/Irvine Ranch Water District (IRWD)

Time Frame: Ongoing

Related Public Safety Element Policies: 1.6, 2.2

SEISMIC HAZARDS

4. Structurally Sound Buildings: The City will require the retrofitting and abatement of unreinforced masonry structures, inventory tilt-up concrete buildings, and require geologic investigations and structural design to make structures as shock resistant and structurally sound as possible or feasible.

Responsible Agency: Community Development

Funding Source: City General Fund/Building Fees/Project Review Fees

Time Frame: Ongoing

Related Public Safety Element Policies: 3.1, 3.3-3.5, 9.1, 9.4

5. Construction Codes: Adopt current Uniform Building, Administrative, Housing, Mechanical, Plumbing and National Electrical Codes, and recommend amendments to standards and uniform codes for special application in Tustin reflecting special topographic, geologic and climatic conditions.

Responsible Agency: Community Development

Funding Source: City General Fund/Building Fees/Project Review Fees

Time Frame: Ongoing

Related Public Safety Element Policies: 3.1, 3.3-3.5, 9.1, 9.4

HAZARDOUS AND TOXIC MATERIALS

6. Control of Hazardous Wastes: Enforce provisions of the City's Hazardous Waste Facilities Ordinance and the Household Hazardous Waste component. Adopt amendments as necessary to update the plans to generate protection of City residents from danger resulting from transportation, storage, disposal or use of hazardous waste within the City. Collaborate with appropriate agencies and industries to define responsibilities and cost allocation procedures for repair and clean-up of hazardous, dangerous, toxic, and other materials.

Responsible Agency: Community Development/Orange County Fire Department

Funding Source: City General Fund/County of Orange Waste Management

Time Frame: Ongoing

Related Public Safety Element Policies: 4.3, 4.5, 4.7, 4.8, 4.10-4.12, 4.14

FIRE HAZARDS

7. Fire Prevention: Promote fire prevention through: (a) coordination with Public Works and the Orange County Fire Department in their review of minimum fire flow and distribution requirements for water in review of new development; (b) adopt the Uniform Fire Code provisions and recommend amendments for special applications in Tustin reflecting special topographic, geologic and climatic conditions; and (c) encourage the Orange County Fire Department to provide public information identifying potential fire hazards in Tustin and preventative measures the public can take to minimize risks.

Responsible Agency: Community Development/Public Works/Private development

Funding Source: City General Fund/Private development/Orange County Fire Department

Time Frame: Ongoing

Related Public Safety Element Policies: 5.2, 5.4, 5.5

CRIME/LAW ENFORCEMENT

8. Law Enforcement: The City will increase crime fighting efforts, encourage increased citizen involvement in crime control, and require building design which discourages criminal behavior. The City's Security Ordinance will be periodically updated.

Responsible Agency: Police Department/Community Development

Funding Source: City General Fund/State and Federal Funding

Time Frame: Ongoing

Related Public Safety Element Policies: 6.1-6.3, 6.5

AIRCRAFT OVERFLIGHTS HAZARDS

9. Airport Land Use Commission (ALUC) Review: The City will refer all proposed General Plan, Zoning Ordinance, Building Code amendments, Specific Plans, and proposed structures which would penetrate the imaginary surface established by the ALUC to the ALUC for review.

Responsible Agency: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related Public Safety Element Policies: 7.1, 7.2

AGENCY RESPONSIBILITIES AND COORDINATION

10. Emergency Plan and Interagency Coordination: Promote public agency responsiveness to emergency situations through:

(a) periodic review and update of emergency plans and coordination with other jurisdictions in implementing those plans; (b) coordination with other jurisdictions in the collection, processing, and dissemination of technical information; (c) regular practice of the City's Emergency Operations Plan by city personnel in a simulated setting; (d) City employee training sessions in emergency response and management skills; (e) preparation of a recovery plan for reconstruction of essential services and facilities in the event of an emergency; (f) development of needed resources and identification of available sources of funding for emergency response; (g) maintenance of an emergency operation center in the Civic Center; and (h) establishment and implementation of procedures for prioritizing services and assistance provided and requested by mutual aid organizations.

Responsible Agency: All City Departments

Funding Source: City General Fund, State Funding, Orange County Funding

Time Frame: Ongoing

Related Public Safety Element Policies: 3.2, 3.7, 3.8, 4.1, 4.2, 4.4, 4.9, 4.15, 5.1, 5.3, 5.6, 6.4, 7.2, 7.3, 8.1, 8.2, 8.4

EMERGENCY RESPONSE AND ACTION

11. Public Information: Disseminate information to the public detailing emergency preparedness for and emergency procedures in the event of different emergency situations, including flood, seismic, hazardous materials, etc.

Responsible Agency: Public Works

Funding Source: City General Fund/Orange County Fire Department

Time Frame: Yearly

Related Public Safety Element Policies: 2.1, 3.6, 4.13, 6.6, 7.4, 8.3, 9.3, 4.6, 9.5

TUSTIN

GENERAL PLAN

Noise Element

T U S T I N
GENERAL PLAN

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INTRODUCTION TO THE NOISE ELEMENT

The control of noise is an essential part of preserving the quality of a community. The development of effective strategies to reduce excessive noise in the community resulting from mobile sources such as traffic, aircraft, rail, and stationary sources, such as construction activity, music and air conditioners is essential to creating a safe and compatible living and working environment. Since 1971, the noise element has been mandatory in a California general plan. Due to California's rapid growth, a noise element is required by the state to enable communities to limit exposure to excessive noise levels. The Noise Element Technical Memorandum provides the necessary background information and supporting documentation for this element.

PURPOSE OF THE NOISE ELEMENT

The Noise Element of a General Plan is a comprehensive approach for including noise control in the planning process. It is a tool for achieving and maintaining environmental noise levels compatible with land use. The Noise Element identifies noise sensitive land uses and noise sources, and defines areas of noise impact. The element establishes goals, policies, and programs to ensure that Tustin residents will be protected from excessive noise.

RELATED PLANS AND PROGRAMS

There are several existing plans and programs that are directly applicable to the aims and objectives of this Element. These plans and programs have been enacted through State and local legislation and are administered by agencies that are delegated with powers to enforce State and local laws.

California Environmental Quality Act Law and Guidelines

The State legislature adopted the California Environmental Quality Act (CEQA) in response to a public mandate that called for a thorough environmental analysis of those projects that might adversely affect the environment. The CEQA law and guidelines, as amended in 1991, describe the provisions of the law, the review procedure, and any subsequent analysis

that is required. CEQA recognizes that excessive noise associated with certain types of public and private projects represents an environmental impact that must be avoided or reduced. CEQA will continue to be instrumental in ensuring that City officials and the general public assess the potentially significant noise impacts of development projects.

California Noise Insulation Standards (Title 24)

The California Commission of Housing and Community Development officially adopted the noise insulation standards in 1974 and they became effective on August 22, 1974. On November 14, 1988, the Building Standards Commission approved revisions to these standards (Title 24, Part 2, California Code of Regulations). The revisions state that "Interior noise levels attributable to exterior sources shall not exceed 45 dB in any habitable room. The noise metric shall be either . . . Ldn or . . . CNEL, consistent with the noise element of the local general plan." Additionally, the commission specifies that residential buildings or structures to be located within exterior CNEL (or Ldn) contours of 60 dB or greater of an existing or adopted freeway, expressway, parkway, major street, thoroughfare, rail line, rapid transit line, or industrial noise source shall require an acoustical analysis showing that the building has been designed to limit intruding noise to an interior CNEL (or Ldn) of 45 dB.

City of Tustin Noise Ordinance/Conditions of Approval

The City's noise ordinance, permitted by the State of California Health and Safety Code, provides a basis for controlling excessive and annoying noise from stationary sources such as construction activity, industrial plants, pumps, compressors, refrigeration units, etc. The ordinance provides specific noise standards to be applied for various land uses for both daytime and nighttime hours, prohibits certain noise sources, and describes the manner in which the noise standards are to be enforced.

Where applicable, the City routinely applies several noise-related conditions of approval to a development before issuing building permits. These conditions identify the proposed project as located in a noise impact area and require that mitigation be provided as necessary to ensure compliance with the City's noise exposure standards.

SCOPE AND CONTENT OF THE ELEMENT

The Noise Element follows the State guidelines prepared by the Office of Noise Control, State Department of Health as a result of Senate Bill 860(A) (effective January 1, 1976). The element quantifies the community noise environment in terms of noise exposure contours for both near- and long-term levels of growth and noise-generating activity. The information is a guideline for the development of goals and policies to achieve noise compatible land uses. In addition to the Introduction, the Element is divided into four sections: Summary of Issues, Needs, Opportunities, and Constraints; Goals and Policies; the Noise Plan, and the Implementation Program.

RELATIONSHIP TO OTHER GENERAL PLAN ELEMENTS

The Tustin General Plan consists of seven different elements. All of the elements - Land Use, Circulation, Housing, Conservation/Open related to the Noise Element.

When integrated with the Noise Element, the Land Use Element will show land uses in relation to existing and projected noise contours. In this way, compatible and incompatible land uses may be identified. The Noise Element relates to the Circulation Element since the circulation system is the primary source of noise throughout the planning area. Noise exposure will be a factor in the location and design of new arterials, and the mitigation of noise from existing arterials in relation to existing and planned land uses.

Since residential land use is noise sensitive, the information provided in the Noise Element will need to be considered in the planning of future housing developments, as discussed in the Housing Element. The Noise Element also relates to the Open Space/Conservation/Recreation Element since excessive noise can have a detrimental impact on the enjoyment of open spaces. Therefore, the information provided in the Noise Element needs to be considered in planning for this type of land use. In addition, open space areas can be used as a buffer to mitigate noise levels at more noise-sensitive residential areas.

Excessive noise can also be detrimental to a person's health or cause hearing loss over long periods of time. Therefore, the Noise Element will need to be considered in the Public Safety Element when assessing occupational environments, and the

noise exposure levels at noise-sensitive areas (residential, parks, schools, libraries, and hospitals).

Finally, growth within the planning area will result in increased housing, increased use of the circulation system and increased noise levels. The Noise Element will need to be considered in the Growth Management Element when planning future developments.

SUMMARY OF ISSUES, NEEDS, OPPORTUNITIES AND CONSTRAINTS

This section summarizes the noise-related issues, needs, opportunities, and constraints for the Tustin Planning Area. These will form the basis for the Noise Element goals and policies.

TRANSPORTATION NOISE CONTROL

- The City of Tustin can exercise little control over flight operations at John Wayne Airport.
- Noise from John Wayne Airport, while generally below accepted CNEL guidelines for residential uses, produces annoyance among Tustin residents due to repetitive occurrence.
- The activities and opportunities at John Wayne Airport should be monitored as needed to protect the planning area from unwanted aircraft noise.
- Citizen involvement in committees that will influence future aircraft operations at John Wayne Airport needs to be encouraged.
- Outside agencies exercise responsibility for noise associated with the freeways and railroads.
- Many residential neighborhoods are located next to heavily traveled arterials, some of which are exposed to "unacceptable" ambient noise levels as defined by the State Office of Noise Control.
- The Tustin Planning Area is bisected by two major freeway corridors - the I-5 and SR-55 - resulting in significant traffic noise levels.
- Increases in traffic volumes will increase noise levels throughout Tustin.
- The activities and proposed future uses of MCAS El Toro should be monitored to protect the planning area from unwanted aircraft noise.

- Flight operations at MCAS(H) Tustin generate a significant noise impact on residential locations throughout the southern and eastern portions of the Planning Area.
- A significant noise source may be replaced with lower or non-noise generating land uses with the closure of MCAS(H) Tustin.
- Noise from train movements and whistles on the Southern California Rail Authority (SCRRA) rail line significantly affects nearby residences.

NOISE AND LAND USE PLANNING INTEGRATION

- Availability of manpower and expertise needed to perform noise measurements and to identify noise control measures in the enforcement of city, state and federal laws is limited.
- Noise control measures and noise-related compatibility considerations need to be included in all new land use developments.
- Enforcement of city, state and federal requirements regarding noise control is necessary, specifically: The City's noise ordinance regarding intrusive noise, the state vehicle code and provisions regarding mufflers and excessively loud radios, the state noise insulation standards for multifamily developments, and the federal and state requirements regarding noise control in work places.
- Many commercial and residential uses in Tustin are located near one another, creating potential noise conflicts between these uses.
- Trucking operations and mechanical equipment associated with commercial/industrial activities impact nearby residences.
- The introduction of mixed-use zones that integrate residences above ground floor commercial uses presents potential noise conflicts from both traffic noise generated from the frontage street and noise generated from ground floor commercial activity.

NON-TRANSPORTATION NOISE CONTROL

- The noise impact of construction activity adversely affects residences when carried on for long periods of time, and on the weekends and in the evenings.
- As in most urban settings, Tustin's residents are subject to noise from nuisances such as lawn mowers, leaf blowers, radios, parties and sporting events.

NOISE ELEMENT GOALS AND POLICIES

A substantial portion of the City is affected by various sources of noise. The following goals and policies are intended to address identified noise issues in the community.

TRANSPORTATION NOISE CONTROL

Transportation-related activities are primary sources of noise affecting the quality of life in Tustin. Effective reduction of noise associated with transportation is necessary to ensure protection from the detrimental effects of excessive noise.

GOAL 1: Use noise control measures to reduce the impact from transportation noise sources.

Policy 1.1: Pursue construction of new barriers, or the augmentation of existing barriers, to reduce noise impacts along the Route 5 and Route 55 freeways along segments directly next to residential areas.

Policy 1.2: Participate in the planning and environmental review process for the proposed Eastern Transportation Corridor to ensure that appropriate noise mitigation measures are included in the design of the project.

Policy 1.3: Encourage John Wayne Airport to set up noise control procedures and to consider methods to reduce and minimize noise exposure due to aircraft flyovers within the Tustin Planning Area.

Policy 1.4: Continue to monitor all John Wayne Airport activities to minimize noise impacts within the Tustin Planning Area resulting from airport operations, and oppose legislation promulgated by the FAA that could eliminate local flight restrictions.

Policy 1.5: Work to reduce risks and noise impacts resulting from aircraft operations by (a) opposing permanent future reuse of MCAS, Tustin for Commercial or general aviation air operations; (b) participate in and monitor the planning processes for John Wayne Airport and reuse on MCAS, El Toro; (c) continue to discourage commercial or general aviation activities which increase noise exposure.

Policy 1.6: Encourage Tustin citizen participation and City involvement on committees that would influence future aircraft operations in Orange County.

Policy 1.7: Encourage construction of noise barriers by the Public Utilities Commission, Southern California Regional Rail Authority, Amtrak, and Orange County Transportation Authority along the Atchison, Topeka and Santa Fe rail line where residences exist next to the track.

Policy 1.8: Encourage the Public Utilities Commission, Southern California Regional Rail Authority, Amtrak, and the Orange County Transportation Authority to minimize the level of noise produced by train movements and whistle noise within the Planning Area by reducing speeds, improving vehicle system technology and developing improved procedures for train engineer whistle blowing.

Policy 1.9: Encourage, where feasible, noise mitigation measures, such as noise barriers and realignments, in the design and construction of new roadway projects in the Tustin Planning Area.

Policy 1.10: Enforce the State's Vehicle Code noise standards within the City.

Policy 1.11: Consider noise impacts to residential neighborhoods when designating truck routes and major circulation corridors.

Policy 1.12: Work with the Orange County Transportation Agency to establish bus routes that meet public transportation needs and minimize noise impacts in residential areas.

NOISE AND LAND USE PLANNING INTEGRATION

Consideration of the effects of noise early in the land use planning process can minimize or avoid detrimental impacts.

GOAL 2: Incorporate noise considerations into land use planning decisions.

Policy 2.1: Adopt planning guidelines that establish acceptable noise standards for various land uses throughout the Tustin Planning Area.

Policy 2.2: Apply the state's noise insulation standards to the conversion of existing apartments into condominiums wherever feasible.

Policy 2.3: Use noise/land use compatibility standards as a guide for future planning and development.

Policy 2.4: Review proposed projects in terms of compatibility with nearby noise-sensitive land uses with the intent of reducing noise impacts.

Policy 2.5: Require new residential developments located in proximity to existing commercial/industrial operations to control residential interior noise levels as a condition of approval.

Policy 2.6: Require that commercial uses developed as part of a mixed-use project (with residential) not be noise intensive. Design mixed-use structures to prevent transfer of noise from the commercial to the residential use.

Policy 2.7: Require new commercial/industrial operations located in proximity to existing or proposed residential areas to incorporate noise mitigation into project design.

Policy 2.8: Replace a significant noise source with non-noise generating land uses when plans for future use of areas are developed.

NON-TRANSPORTATION NOISE CONTROL

Sources of noise that are not related to transportation can be controlled to avoid exposure to excessive noise levels.

GOAL 3: Develop measures to control non-transportation noise impacts.

Policy 3.1: Implement a review process of Tustin's noise ordinance, and City policies and regulations affecting noise.

Policy 3.2: Minimize the impacts of construction noise on adjacent land uses through limiting the permitted hours of activity.

Policy 3.3: Require City departments to observe state and federal occupational safety and health noise standards.

Policy 3.4: Require new equipment and vehicles purchased by the City to comply with noise performance standards consistent with available noise reduction technology.

RELATED GOALS AND POLICIES

Goals and policies of the other General Plan Elements also relate to issues addressed in the Noise Element. To ensure internal consistency, Table N-1 lists each element, noise issues, and the goals and policies that relate to both.

TABLE N-1
NOISE RELATED GOALS AND POLICIES BY ELEMENT

Noise Issue Area	Related Goals and Policies by Element						
	Land Use	Housing	Circulation	Noise	Conservation/ Open Space/ Recreation	Public Safety	Growth Management
Transportation Noise Control			3.2				
Noise and Land Use Planning Integration			1.13				
Non-Transportation Noise Control							

THE NOISE PLAN

To achieve the goals and objectives of the Noise Element, an effective Noise Plan implementation program developed within the constraints of the City's financial and staffing capabilities is necessary. The purpose is to reduce the number of people exposed to excessive noise and to minimize the future effect of noise in the City.

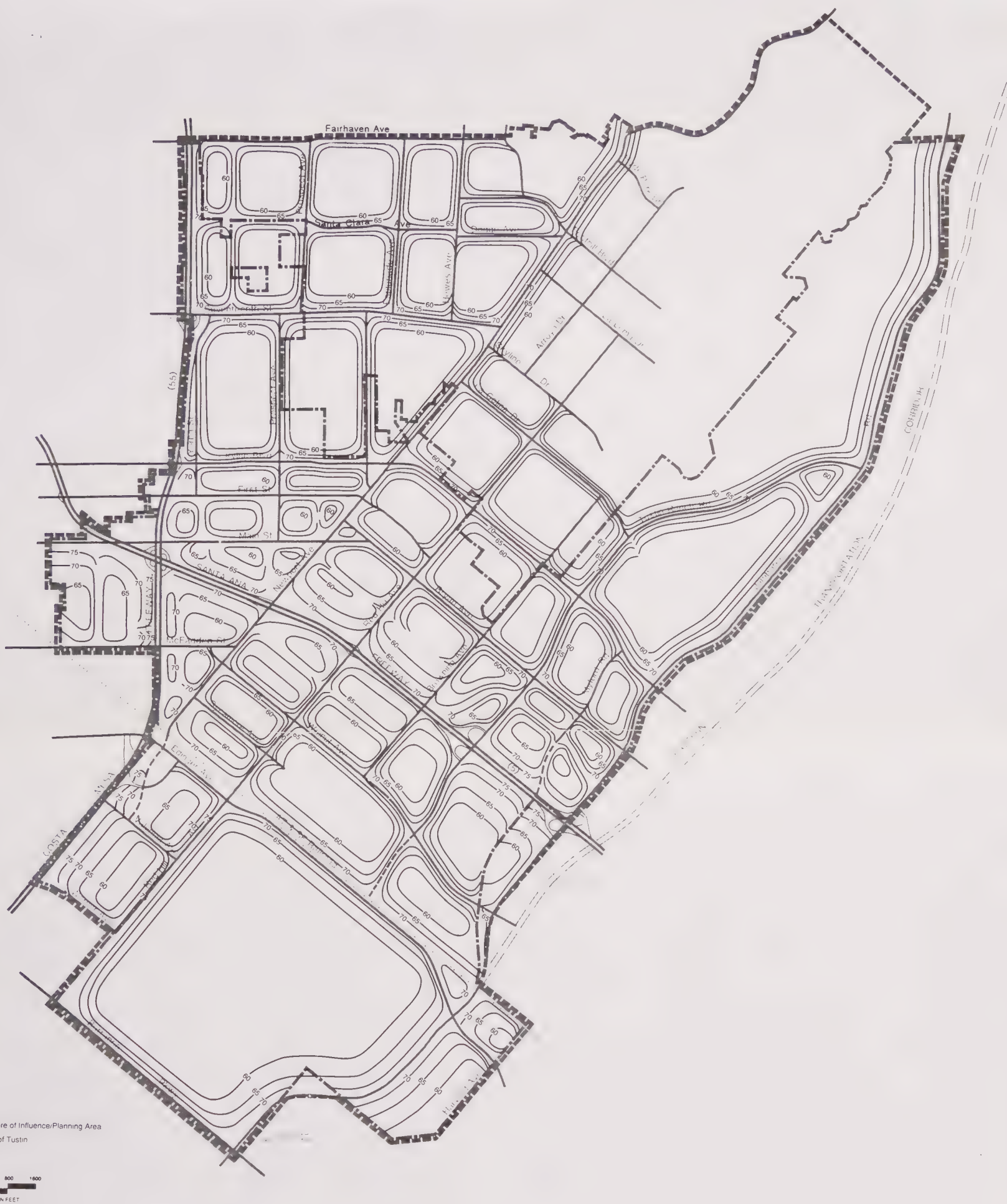
COMMUNITY NOISE CONTOURS

The noise environment for the Tustin Planning Area can be described using noise contours developed for the major noise sources within the area. Noise contours represent lines of equal noise exposure. Figure N-1 presents the noise contours for the Tustin Planning Area for Land Use Policy Map buildout conditions. The contours shown on the maps range from a CNEL of 60 dB to 80 dB for aircraft, train, and traffic noise. Full size exhibits (scale: 1"=800') are available for inspection at the Community Development Department.

The noise contours for the Tustin Planning Area were developed based upon existing and future traffic conditions, train operations and environmental conditions. The assumptions and methods used to develop the contours are explained in detail in the Technical Memorandum.

Noise Impact Areas

The noise contours are used as a guide for planning. The 60 dB CNEL contour defines the noise impact area. Any proposed new noise sensitive land use (i.e., residential, hospitals, schools and churches) within this area shall be evaluated on a project specific basis to meet City or State (Title 24) standards. An acoustical analysis prepared by a qualified acoustical engineer, should be required in these Noise Impact Areas for all noise sensitive land uses verifying that the structure has been designed or mitigation measures proposed to limit intruding noise to the prescribed allowable levels.



SOURCE: J.J. Van Houten & Associates, July 1993

TUSTIN
GENERAL PLAN

Figure N-1
Future (2010) Community Noise Equivalent
Level (CNEL) Contours for the
Tustin Planning Area

Areas of Special Concern

Areas of special concern within the Noise Impact Area are near the I-5 and SR-55 freeways. At these locations the existing CNEL ranges from 70 to 80 dB. Caltrans will construct soundwalls along these freeways as part of the freeway widening projects. These walls will reduce the CNEL at the adjacent residences to 70 dB or less.

Residences next to a number of major and secondary arterials in the Tustin Planning Area are also exposed to a CNEL over 65 dB. These arterials include:

- Bryan Avenue
- Fairhaven Avenue
- Newport Avenue
- Yorba Street
- Browning Avenue
- El Camino Real
- Walnut Avenue
- Edinger Street
- Irvine Boulevard
- Red Hill Avenue
- Prospect Avenue
- 17th Street
- McFadden Street
- Sycamore Avenue

Measurements show that residences located next to the Southern California Regional Rail Authority (SCRRA) rail line are currently exposed to a CNEL of about 70 dB and maximum noise levels of 78 dB(A). By the year 2010, the CNEL at the adjacent residences will increase by as much as 6 dB due to increased rail activity related to Community Rail activities (Metrolink). The primary source of annoyance at these locations will be late night and early morning train passes.

LAND USE COMPATIBILITY GUIDELINES AND STANDARDS

Table N-2 provides guidance for the acceptability of certain development projects within specific CNEL contours and will act as a set of criteria for assessing the compatibility of proposed land uses within the noise environment.

Land Use Compatibility Guidelines are the basis for development of the specific noise standards presented in table N-3 which should be utilized as city policy related to new land uses and acceptable noise levels development.

For the City to achieve noise and land use compatibility it is imperative that mitigation measures be imposed during site planning to mitigate anticipated noise impacts on affected noise

sensitive land uses. The submittal of an acoustical analysis report in noise impact levels is one mechanism to evaluate proposed projects. The incorporation of mitigation measures as described in this Noise Plan and other action may enable a project to comply with exterior and interior noise compatibility guidelines and standards.

Construction Standards

The provisions of the State of California Noise Insulation Standards (California Administrative Code, Title 24) specifying that the indoor noise levels for multifamily residential living spaces shall not exceed 45 dB CNEL (or Ldn) due to the combined effect of all noise sources will be enforced. The State requires implementation of this standard when the outdoor noise levels exceed 60 dB CNEL (or Ldn). The noise contour maps can be used to decide when this standard needs to be addressed. The code requires that this standard be applied to all new hotels, motels, apartment houses and dwellings, other than detached single family dwellings. The City will also, as a matter of policy, apply this standard to new single family developments and condominium conversion projects where feasible.

The noise levels presented in Table N-2 represent exterior noise levels. The primary purpose of the noise compatibility matrix is to identify potential conflicts between proposed land uses and the noise environment. The matrix is usually used at the General Plan or zoning level of approvals. If a project falls within Zone A or Zone B the project is considered compatible with the noise environment. Zone A implies that no mitigation will be needed. Zone B implies that minor soundproofing of the structure may be needed and should be engineered before issuance of building permits. Zone C shows that substantial noise mitigation will be necessary, such as construction of noise barriers and substantial building sound insulation. However, projects in Zone C can be successfully mitigated. The project may be approved for land use and then is mitigated as necessary to achieve City standards (Table N-3) before issuance of building permits or other appropriate milestones.

TRANSPORTATION NOISE CONTROL

The most efficient and effective means of controlling noise from transportation systems is to reduce noise at the source.

**TABLE N-2
LAND USE NOISE COMPATIBILITY MATRIX**

LAND USE CATEGORIES		COMMUNITY NOISE EQUIVALENT LEVEL CNEL						
CATEGORIES	USES	<55	60	65	70	75	80	>
RESIDENTIAL	Single Family, Duplex, Multiple Family	A	A	B	C	C	D	D
RESIDENTIAL	Mobile Home	A	A	B	C	C	D	D
COMMERCIAL Regional, District	Hotel, Motel, Transient Lodging	A	A	B	B	C	C	D
COMMERCIAL Regional, Village District, Special	Commercial Retail, Bank, Restaurant, Movie Theater	A	A	A	A	B	B	C
COMMERCIAL INDUSTRIAL INSTITUTIONAL	Office Building, Research and Develop- ment, Professional Offices, City Office Building	A	A	A	B	B	C	D
COMMERCIAL Recreation INSTITUTIONAL Civic Center	Amphitheater, Concert Hall Auditorium, Meeting Hall	B	B	C	C	D	D	D
COMMERCIAL Recreation	Children's Amusement Park, Miniature Golf Course, Go-cart Track, Equestrian Center, Sports Club	A	A	A	B	B	D	D
COMMERCIAL General, Special INDUSTRIAL, INSTITUTIONAL	Automobile Service Station, Auto Dealer- ship, Manufacturing, Warehousing, Whole- sale, Utilities	A	A	A	A	B	B	B
INSTITUTIONAL General	Hospital, Church, Library, Schools' Class- room	A	A	B	C	C	D	D
OPEN SPACE	Parks	A	A	A	B	C	D	D
OPEN SPACE	Golf Course, Cemeteries, Nature Centers Wildlife Reserves, Wildlife Habitat	A	A	A	A	B	C	C
AGRICULTURE	Agriculture	A	A	A	A	A	A	A

INTERPRETATION

**ZONE A
CLEARLY COMPATIBLE**

Specified land use is satisfactory, based upon the assumption that any buildings involved are of normal conventional construction without any special noise insulation requirements.

**ZONE B
NORMALLY COMPATIBLE**

New construction or development should be undertaken only after detailed analysis of the noise reduction requirements are made and needed noise insulation features in the design are determined. Conventional construction, with closed windows and fresh air supply systems or air conditioning, will normally suffice.

**ZONE C
NORMALLY INCOMPATIBLE**

New construction or development should generally be discouraged. If new construction or development does proceed, a detailed analysis of noise reduction requirements must be made and needed noise insulation features included in the design.

**ZONE D
CLEARLY INCOMPATIBLE**

New construction or development should generally not be undertaken.

Source: J.J. Van Houten & Associates

**TABLE N-3
INTERIOR AND EXTERIOR NOISE STANDARDS**

Land Use	Noise Standards ¹	
	Interior ^{2,3}	Exterior
Residential - Single family, multifamily, duplex, mobile home	CNEL 45 dB	CNEL 65 dB ⁴
Residential - Transient lodging, hotels, motels, nursing homes, hospitals	CNEL 45 dB	CNEL 65 dB ⁴
Private offices, church sanctuaries, libraries, board rooms, conference rooms, theaters, auditoriums, concert halls, meeting halls, etc.	Leq(12) 45 dB(A)	-
Schools	Leq(12) 45 dB(A)	Leq(12) 67 dB(A) ⁵
General offices, reception, clerical, etc.	Leq(12) 50 dB(A)	-
Bank lobby, retail store, restaurant, typing pool, etc.	Leq(12) 55 dB(A)	-
Manufacturing, kitchen, warehousing, etc.	Leq(12) 65 dB(A)	-
Parks, playgrounds	-	CNEL 65 dB ⁵
Golf courses, outdoor spectator sports, amusement parks	-	CNEL 70 dB ⁵

NOTES

1. CNEL: Community Noise Equivalent Level.
Leq(12): The A-weighted equivalent sound level averaged over a 12-hour period (usually the hours of operation).
2. Noise standard with windows closed. Mechanical ventilation shall be provided per UBC requirements to provide a habitable environment.
3. Indoor environment excluding bathrooms, toilets, closets and corridors.
4. Outdoor environment limited to rear yard of single family homes, multifamily patios and balconies (with a depth of 6' or more) and common recreation areas.
5. Outdoor environment limited to playground areas, picnic areas, and other areas of frequent human use.

However, since the City has little direct control over source noise levels because of state and federal preemption (i.e., State motor vehicle noise standards and Federal air regulations), programs should be focused on reducing the impact of the noise on the community. Cooperative efforts with state and federal offices are essential.

Within the Tustin Planning Area are several transportation related noise sources including train tracks, two freeways, major arterials, collector roadways, a helicopter station, and a commercial airport. These sources are the major contributors of noise in Tustin. Cost effective strategies to reduce their influence on the community noise environment are an essential part of the Noise Element.

Noise Barriers

The most effective method for mitigating transportation noise is through reducing the impact of the noise onto the community by utilizing the site design review process and the California Environmental Quality Act. Mitigation through site planning, landscaping, as well as topography, and the design and construction of a noise barrier (wall, berms, or combination wall/berms) are the most common ways of alleviating traffic noise impacts in existing urban environments. Setbacks can also be used to provide partial mitigation or full mitigation where a small noise reduction is needed.

Noise attenuating barriers are commonly incorporated into projects and can be extremely effective in reducing noise levels. The effectiveness of the barrier depends on the relative height and materials of the barrier, the noise source, the affected area, the horizontal distance between the source and the barrier, and between the barrier and the affected area. Although noise barriers can be extremely effective, their aesthetic effect on a neighborhood should be considered.

Noise mitigation measures should be included in the design of roadway improvement projects consistent with funding capability. Efforts by the California Department of Transportation, the Orange County Transportation Agency and others to provide for acoustical protection of existing noise sensitive land uses affected by these projects will be supported by the City, and consideration of soundwalls will be requested to mitigate significant adverse impacts as part of any Caltrans and OCTA roadway projects. The Route 5 and 55 freeways, and the proposed

Eastern Transportation Corridor are primary candidate projects for the inclusion of barriers to reduce noise impact.

The use of walls and berms in the design of new residential and other noise sensitive land uses that are next to major roads, rail lines, commercial, or industrial areas may be extremely helpful in mitigating noise impacts. The City will also encourage the reduction of train noise by requesting that the Southern California Regional Rail Authority, OCTA and Amtrak reduce speed and use welded track in good repair throughout the Planning Area.

Noise Control At The Source

The California Vehicle Code contains noise limits applicable to new vehicles at the time of manufacture and noise regulations pertaining to the operation of all vehicles on public roads.

The City will provide for continued evaluation and enforcement of truck and bus movements and routes to minimize noise at the source for sensitive land uses. Regulation of traffic flow can also significantly minimize noise impacts. The State Motor Vehicle noise standards for cars, trucks, and motorcycles will be enforced through coordination with the California Highway Patrol and the Tustin Police.

The City and its citizens will also participate in the planning processes for John Wayne Airport, MCAS(H) Tustin, and MCAS El Toro. Any changes in operations or land uses within the facilities that will increase noise exposures in the Planning Area will be opposed. The City will encourage implementation of procedures that will reduce noise levels in the area and will minimize the number of aircraft overflights.

NON-TRANSPORTATION NOISE CONTROL

People, and noise sensitive areas, must be protected from excessive noise generated by non-transportation sources including commercial and industrial centers. These impacts are most effectively controlled through the environmental and site plan review process by imposition of mitigation measures and the application of a City Noise Ordinance.

Typical Mitigation for Industrial and Commercial Uses

Consideration should be given to the control of noise in new commercial and industrial developments when noise levels would otherwise be generated that would exceed the noise level for the district in which they are located and that would adversely affect nearby projects. The following mitigation measures could be applied when reviewing these new projects:

- *Furnaces* - Acoustically treat natural draft and/or forced draft units and combustion air intake plena. Insulation of firing walls and damped and lined ducting are but a few of the treatments that could be considered.
- *Fans* - Air cooled heat exchangers can be provided with silencers where effective (i.e., primarily on small, high-speed air fans). For larger coolers, quieter equipment can be installed.
- *Motors* - Quiet-design motors can be employed and located to minimize impacts on nearby properties.
- *Centrifugal Compressors* - Centrifugal compressors can be equipped with inlet and discharge silencers. Acoustical enclosures may also be considered.
- *Centrifugal Pumps* - Centrifugal pumps may be equipped with suction and discharge piping that has been acoustically treated. Acoustical enclosures may be considered.
- *Steam and Gas Generators* - Acoustical enclosures for turbines may be effective in reducing noise. Inlet and discharge piping may be acoustically treated and expansion joints added or comparable attenuative modifications made to minimize structure-borne vibrations.
- *Control Valves* - Quiet valves should be used whenever available. In other circumstances, in-line silencers can be employed.
- *Atmospheric Vents, Exhaust and Intakes* - Noisy vents should be equipped with silencers. Where safety is no an overriding concern, vents should be positioned close to the ground or below grade.

- *Paging Systems* - Loudspeaker paging systems shall be regulated pursuant to the City's noise ordinance. Whenever possible suitable alternatives such as radio or visual paging systems should be utilized.
- *Delivery/Loading Areas* - Limit delivery hours for stores with loading areas or docks fronting, bordering, or gaining access in driveways next to noise sensitive uses.

Noise Ordinance

The City's noise ordinance will be reviewed periodically for adequacy and changes implemented as needed to address the City's current needs. The noise ordinance will continue to be enforced to ensure that adjacent properties are not exposed to excessive noise levels from stationary sources. The ordinance protects people from non-transportation related noise sources such as music, construction activity, machinery and pumps, air conditioners, and truck traffic on private property. The Community Development Department will act as noise control coordinator. This will ensure the continued operation of noise enforcement efforts of the City.

Application of the provisions of the Noise Ordinance will include: (a) requiring that any proposed development projects show compliance with the City's Noise Element and Ordinance; (b) requiring construction activity to comply with limits established in the City's Noise Ordinance; and (c) requiring all City departments to comply with the state and federal OSHA noise standards, and any new equipment or vehicle purchases to comply with city, state, and federal noise standards.

NOISE ELEMENT IMPLEMENTATION PROGRAM

The City's Noise Element provides information that is important for maintaining environmental noise levels that are compatible with existing and planned land uses. The Element addresses three primary areas: noise from transportation services, such as aircraft, freeways and major roadways; integration of information about the existing and forecasted noise environment into land use planning decisions; and noise from non-transportation sources such as commercial, industrial, and construction activities.

The City Council, by incorporating the Implementation Program into the General Plan, recognizes the importance of long-range planning considerations in day-to-day decision-making, subject to funding constraints.

TRANSPORTATION NOISE CONTROL

1. Roadway Improvement Projects: The principal method of protecting sensitive land uses from traffic noise is the construction of noise barriers in concert with road improvement projects. The City will request, where necessary to mitigate identified adverse significant noise impacts, the inclusion of soundwalls, earthen berms, or other acoustical barriers as part of any Caltrans or OCTA roadway project.

Responsible Agency/Department: Community Development, Public Works/Engineering Division

Funding Source: Various Proposition 111, Measure M, Santa Ana/Tustin TSIA, Redevelopment Agency

Time Frame: Ongoing

Related Noise Element Policies: 1.1, 1.2, 1.9, 1.12

2. Rail Line Noise Control: The principal methods of protecting sensitive land uses from rail vehicle noise are the construction of noise barriers, reduction of vehicle speed, the use of well-maintained welded track, rubberized crossings and whistle blowing procedures. The City will seek assistance from the Public Utilities Commission, Southern California Regional Rail

Authority, OCTA, and Amtrak in achieving these methods of noise protection for residential and other sensitive uses.

Responsible Agency/Department: Community Development, Public Works/Engineering

Funding Source: Public Utilities Commission, Southern California Regional Rail Authority, OCTA, Amtrak, Redevelopment Agency

Time Frame: Ongoing

Related Noise Element Policies: 1.7, 1.8

3. Vehicle Noise Control: To minimize or reduce noise impacts on residential and other sensitive land uses, the City will: 1) enforce and periodically evaluate truck and bus movements and routes to reduce impacts on sensitive areas; and 2) promote coordination between City Police and the California Highway Patrol to enforce the State Motor Vehicle noise standards.

Responsible Agency/Department: Community Development, Public Works/Engineering, Police Dept., CHP

Funding Source: City General Fund

Time Frame: Ongoing

Related Noise Element Policies: 1.1, 1.2, 1.9-1.12

4. Aviation Noise: Work to reduce noise impacts resulting from aircraft operations and John Wayne Airport and MCAS, El Toro by: (a) participating and monitoring the planning processes for John Wayne Airport and reuse of MCAS, El Toro; (b) continuing to discourage general and commercial aviation activities which increase noise exposure to sensitive land uses.

Responsible Agency/Department: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related Noise Element Policies: 1.3-1.6

5. Aviation Monitoring: The City shall continue to review and report on the noise reports received concerning John Wayne Airport to identify any of the areas of the City where negative impacts exist in order to implement mitigation efforts, which could include lobbying of the FAA and related agencies for tighter restrictions on aircraft types.

Responsible Agency/Department: Community Development

Funding Source: City General Fund

Time Frame: Ongoing

Related Noise Element Policies: 1.3-1.6

NOISE AND LAND USE PLANNING INTEGRATION

6. Compatibility Standards Application: Through the Design Review process Noise Element Standards of compatibility described in Tables N-2 and N-3 of the Element will be applied to new development proposals and methods to mitigate anticipated impacts, such as building orientation and acoustical barriers, shall be applied to meet the standards.

Responsible Agency/Department: Community Development

Funding Source: Development fees

Time Frame: Ongoing

Related Noise Element Policies: 2.1, 2.3-2.8

7. Noise Insulation: Interior and exterior noise levels for proposed new development shall be required to meet the California Noise Insulation Standards (Title 24 of the California Administrative Code). These standards shall also be applied to all single family developments and condominium conversion projects where feasible.

Responsible Agency/Department: Community Development

Funding Source: Development fees

Time Frame: Ongoing

Related Noise Element Policies: 2.1, 2.2, 2.5, 2.6

8. Acoustical Analysis: Acoustical analysis reports prepared by a qualified acoustical engineer will be required for new sensitive land uses within Noise Impact Areas identified in the Noise Plan.

Responsible Agency/Department: Community Development

Funding Source: Developer

Time Frame: Ongoing

Related Noise Element Policies: 2.4, 2.7

NON-TRANSPORTATION NOISE CONTROL

9. Noise Ordinance Enforcement: The City will enforce its Noise Ordinance to reduce excessive noise from site-specific sources, such as construction activity mechanical equipment, landscaping maintenance, loud music, truck traffic, loading and unloading activities, and other sources.

Responsible Agency/Department: Community Development, Police Department

Funding Source: City General Fund

Time Frame: Ongoing

Related Noise Element Policies: 3.1, 3.2, 3.3

10. Noise Ordinance Review: The City shall periodically review its Noise Ordinance, policies and regulations affecting noise sources in order to conform with changes in legislation and/or technologies.

Responsible Agency/Department: Community Development

Funding Source: City General Funds

Time Frame: At least once every five years

Related Noise Element Policies: 3.1

11. Occupational Safety and Health Noise Standards: City departments will comply with all state and federal OSHA noise standards and all new equipment purchases shall comply with state and federal noise standards.

Responsible Agency/Department: City Manager

Funding Source: City General Fund

Time Frame: Ongoing

Related Noise Element Policies: 3.3, 3.4

TUSTIN

GENERAL PLAN

Growth Management Element

T U S T I N
GENERAL PLAN

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INTRODUCTION TO THE GROWTH MANAGEMENT ELEMENT

The City of Tustin is a part of the rapidly growing Southern California region. Growth in the City should not be allowed to exceed existing transportation infrastructure capacity, and planning and development activities in the City should be coordinated with those of surrounding communities. The broad nature of growth impacts requires that local planning decisions take into account regional issues and be coordinated with State, regional and County planning efforts.

PURPOSE

The primary purpose of this element is to ensure that growth and development is based upon the City's ability to provide an adequate traffic circulation system pursuant to the Orange County Division, League of California Cities "Countywide Traffic Improvement and Growth Management Plan Component." This element also guides Tustin's participation in interjurisdictional planning efforts and establishes a goal that the provision of jobs and housing be balanced.

SCOPE AND CONTENT

The Growth Management Element contains policies for the planning and provision of traffic improvements that are necessary for orderly growth and development. Presented in this element are policies and programs for the establishment of specific traffic level of service (LOS) standards, development mitigation and development phasing. Also presented are goals and policies related to coordinating and cooperating with other jurisdictions to manage growth, and goals and policies related to the balance between jobs and housing in the City.

This element satisfies the growth management requirement of the Revised Traffic Improvement and Growth Management Ordinance (Measure M) and conforms to the guidelines for Growth Management elements as set forth in the Orange

County, Countywide Growth Management Program Implementation Manual of April, 1991.

Tustin is a largely developed community with most of its infrastructure already in place. For this reason it is considered a Developed Community for the purposes of Measure M. As a result, this element does not need to address certain infrastructure issues, such as fire, sheriff/police, and library facilities, required to be addressed by developing communities.

The East Tustin area constitutes the portion of the City that is presently developing. All of the backbone infrastructure in East Tustin is already in place and the remaining infrastructure, including financing, is planned. In addition, the Tustin Marine Corps Air Station may represent an area with significant infrastructure needs in the future if that station is closed. Infrastructure planning will be integrated into planning for that site if its current use is changed and redevelopment of the base will be required to address the costs of additional infrastructure required to serve it.

CONSISTENCY WITH OTHER GENERAL PLAN ELEMENTS

A major goal of the Growth Management Element is to ensure that the planning, management and implementation of traffic improvements and public facilities are adequate to meet the current and projected needs of the City. While this goal is a high priority, it must be achieved while maintaining internal consistency among the other elements of the General Plan as required by State law. Therefore, the Growth Management Element does not replace or supersede any of the other General Plan elements; instead, the Element addresses, amplifies and supports the goals and policies that are included in the other General Plan elements and establishes new goals and policies where necessary.

The Growth Management Element is implemented through various coordinated programs developed to support and carry out its goals, objectives and policies. In addition, this element minimizes duplication between Measure M and Congestion Management Program (CMP) requirements (see Related Plans and Programs below).

RELATED PLANS AND PROGRAMS

Many federal, state, regional, and Orange County plans and laws affect growth management in the City. Broadly, they include the Orange County Growth Management Plan, the Southern California Association of Governments (SCAG) Growth Management Plan, South Coast Air Quality Management Plan (AQMP), State Assembly Bill 471 (Proposition 111 - Congestion Management), and Measure M (Orange County). Of all of these measures, M will have the most direct and significant impact upon the City's Growth Management Plan. Each of these plans and/or systems is described below.

Orange County Growth Management Plan Element

The stated purpose of the Orange County Growth Management Plan Element is to ensure that the planning, management and implementation of traffic improvements and public facilities are adequate to meet the current and projected needs of Orange County. The Plan sets forth goals, objectives, policies, and implementation programs for growth management. The goals of the Plan are summarized as follows:

"...to reduce traffic congestion, ensure that adequate transportation facilities, public facilities, equipment and service are provided for existing and future residents and to protect the natural environment of Orange County."

The Plan establishes the following five major policies:

1. **Development Phasing:** Development will be phased according to Comprehensive Phasing Plans (CPPs) adopted by the County. Phasing will be linked to roadway and public facility capacities.
2. **Balanced Community Development:** Development will be balanced to encourage employment of local residents and both employment and employee housing, in the County generally as well as in individual Growth Management Areas (GMAs).
3. **Traffic Level of Service:** This policy requires development project sponsors to make improvements to intersections significantly impacted by the "projects". A Level of Service "D" must be attained at affected intersections. A "significant

impact" is generally defined in terms of increases in intersection capacity utilization and levels of service. The policy also establishes a Deficient Intersections List and establishes a developer fee program to pay for improving affected intersections on a pro-rata basis.

4. **Traffic Improvement Programs:** The Plan provides for the establishment of comprehensive traffic improvement program to ensure that all new development provides necessary transportation facilities and intersection improvements as a condition of development approval.
5. **Public Facility Plans:** The Plan requires comprehensive public facility plans for fire, sheriff/police, and library services. New development shall participate on a pro-rata basis.

To implement its policies, the Plan sets forth four implementation programs. These include the following:

1. **Growth Management Areas (GMAs):** The Plan calls for the establishment of Growth Management Areas in order to implement the Comprehensive Phasing Plans.
2. **Facility Implementation Plans (FIPs):** These plans address the financing of transportation, police/sheriff, fire, library facilities and flood control for each GMA in accordance with the goals, objectives and policies of the Growth Management Plan Element.
3. **Countywide Implementation of Growth Management Plan:** This involves an annual evaluation of compliance with development phasing, planned roadway and/or public facility development, and maintenance of service levels.
4. **Traffic Improvement/Public Facility Development Agreements:** This program requires that any public service or traffic improvements implemented through Development Agreements must be consistent with the overall Orange County Growth Management Plan.

The Orange County Growth Management Plan Element further provides that additional implementation programs may be developed as deemed necessary by the County.

SCAG Growth Management Plan

The SCAG Growth Management Plan recommends ways to redirect the region's growth in order to minimize congestion and better protect the environment. While SCAG has no authority to mandate implementation of its Growth Management Plan, some of the Plan's principal goals (such as improved jobs/housing balance) are being implemented through the South Coast Air Quality Management Plan (AQMD) which the South Coast Air Quality Management District does have the authority to implement.

South Coast Air Quality Management Plan

The South Coast Air Quality Management Plan mandates a variety of measures to reduce traffic congestion and improve air quality, including the Regulation XV Commuter Program which requires employers of more than 100 persons to prepare trip reduction plans, and the requirement that each jurisdiction develop an Air Quality component within its general plan. These and other measures are to be implemented gradually over several years. The City is subject to all AQMP requirements for local jurisdictions.

Assembly Bill 471 (Proposition 111)

Assembly Bill (AB) 471, as subsequently modified by Assembly Bill 1791, requires every urbanized city and county with a population of 50,000 or more, to adopt a Congestion Management Plan (CMP) to reduce traffic congestion. A city or county which does not comply with the CMP requirement will lose gasoline sales tax revenues to which it would otherwise be entitled. Tustin has completed a CMP for its 1991 submittal, and will continue to work with the County on annual updates to the CMP.

The CMP requirements include traffic level of service (LOS) standards, a trip reduction program, and a seven-year capital improvements program for traffic and transit. Many of the AB 471 requirements are the same or similar to the requirements of Measure M (discussed below). The County has attempted to reconcile overlapping requirements through the Measure M implementation guidelines. (see Countywide Growth Management Program Revised Traffic Improvement and Growth Management Ordinance Implementation Manual).

Measure M

Orange County voters approved a measure (Measure M) in 1990 to allocate additional funds to provide needed transportation facilities in Orange County. Measure M specifically authorized a half cent retail sales tax increase for a period of 20 years effective April 1, 1991. The monies received from Measure M will be returned to local jurisdictions for use on local and regional transportation improvements and maintenance projects. The tax is estimated to raise approximately \$3.1 billion Countywide over the 20 years. The County of Orange is divided into eleven (11) GMA's and the City of Tustin is currently contained within GMA # 7 along with portions of the cities of Irvine, Santa Ana, Orange and the County of Orange. The estimated average annual allocation per GMA is approximately \$454,500. In order to qualify for these revenues, however, Measure M requires each City to comply with the Orange County Division, League of California Cities - Countywide Traffic Improvement and Growth Management Program which was included by reference in the Measure M ordinance. The Countywide Growth Management Program is designed to achieve a cooperative process among local Orange County jurisdictions to coordinate and implement traffic improvements and stronger planning on a Countywide basis.

In order to receive its allocation of Measure M funds, the City must submit a statement of compliance with the growth management components which are summarized as follows:

Adoption of a Growth Management Element that includes:

- Traffic Level of Service (LOS) standards
- Development mitigation program
- Development phasing and annual monitoring program

Participation in interjurisdictional planning forums

Development of a 7-year Capital Improvement Program

Address housing options and job opportunities

Adoption of a Transportation Demand Management Ordinance.

PLANNED TRANSPORTATION IMPROVEMENTS

As the City of Tustin and the entire southern California region continues to grow, additional demands will be placed on the transportation network within the City. The following major transportation programs and projects have been identified as part of the Tustin General Plan update to help alleviate future traffic congestion:

- Upgrading of the Newport and Santa Ana Freeways;
- Completion of the western leg of the Eastern Transportation Corridor;
- Buildout of existing and proposed arterials, collectors, interchanges, and superstreet links, including extension of Newport Avenue from south of Sycamore Avenue to Valencia Avenue and extension of Tustin Ranch Road from Walnut Avenue to Edinger Avenue. The extension of Jamboree Road from its southern terminus at Edinger Avenue to Barranca Parkway is currently underway;
- Coordination of circulation system improvements with the City of Santa Ana through the Santa Ana/Tustin Transportation System Improvement Program;
- Promotion of increased ridership through alternate means of travel such as the connection and expansion of High Occupancy Vehicle (HOV) lanes with existing roadways and expansion of public transit routes; and
- Efficient utilization of existing roadway capacity through Transportation System Management (TSM) strategies.

GROWTH MANAGEMENT ISSUES, NEEDS, OPPORTUNITIES AND CONSTRAINTS

The City of Tustin is part of a large, fast-growing region. During the last decade or so, the pace of new development has begun to outstrip the ability of infrastructure to adequately support that development. The Growth Management Element addresses primarily the issues associated with rapid growth, traffic congestion, and transportation facilities.

- The City's constant rate of growth and development and impacts of growth in adjacent jurisdictions and throughout the County has created a necessity for a regional approach to transportation growth management.
- A significant portion of transportation problems in the County stem from the inadequate capacity of the freeway system to serve peak period travel demands. This lack of capacity results in poor levels of service characterized by severe congestion and low travel speeds during peak hours. The most severe congestion occurs at the junction of I-5 and SR-55.
- Actual highways are intended to handle the bulk of intra-regional traffic and complement the freeway system and local street network. As congestion increases on the freeway, more drivers utilize the arterial system, particularly those that parallel the freeways or those arterials serving the same trip destination as the freeway. Consequently, these arterials, such as Newport Avenue, Redhill Avenue, and Irvine Boulevard are becoming increasingly congested and receive heavy traffic volumes well in excess of their design capacity. This situation is of special concern on those arterials which provide access to the freeway system.
- The City's transportation system is greatly influenced by impact of two freeways which run through the City - the I-5 (Santa Ana) Freeway and the SR-55 (Newport-Costa Mesa) Freeway.
- Traffic congestion in Tustin is as much a regional as it is a local problem. The development which occurs in neighboring jurisdictions and throughout the County has effects upon the freeways and many of the major arterials

that traverse the City of Tustin. Thus, it is not possible for the City to fully address growth management issues in isolation of other jurisdictions.

GROWTH MANAGEMENT ELEMENT GOALS AND POLICIES

The following new goals and policies are designed to meet all the Growth Management Element requirements for Developed Communities as set forth by Measure M and elaborated by the Countywide Growth Management Program Implementation Manual.

TRAFFIC CONGESTION

Traffic congestion is a problem on local streets as well as arterials and regional freeways. In particular, heavy traffic volumes in Tustin exist along Redhill Avenue between Warner Avenue and Edinger Avenue, along Seventeenth Street in the vicinity of Yorba Street, and along Irvine Boulevard between the Newport-Costa Mesa Freeway and Browning Avenue. Traffic volumes along the I-5 corridor are also extremely heavy and cause significant slowing during the peak hours.

GOAL 1: Reduce traffic congestion.

Policy 1.1: Within three years of the issuance of the first building permit for a development project or within five years of the first grading permit for said development project, whichever occurs first, ensure that the necessary improvements to transportation facilities to which the project contributes measurable traffic are constructed and completed to attain Level of Service (LOS) "D" at the intersections under the sole control of the City. Intersections under the jurisdiction of another City or the County or the State or those included on the Deficient Intersection List established by the City and compiled by the GMA (Growth Management Area) in which the City participates (see Policy 3.1) are exempt from this requirement.

Policy 1.2: Level of Service (LOS) will be measured by the Traffic Level of Service Policy Implementation Manual established by the Local Transportation Authority.

Policy 1.3: All development contributing measurable impacts to intersections on the Deficient Intersection List and all projects contributing cumulatively, or individually, 10 percent or more of

the traffic using an intersection shall be assessed a mitigation fee determined by the jurisdictions in the GMA and locally administered as part of the City's Capital Improvement Program.

Policy 1.4: Promote traffic reduction strategies through TDM measures adopted by City ordinance.

ADEQUATE TRANSPORTATION FACILITIES

Many of the regional transportation facilities are not adequately sized to accommodate existing and projected growth. Largely in response to this situation, Orange County voters approved a measure (Measure M) in 1990 to allocate additional funds to provide needed transportation facilities.

GOAL 2: Ensure adequate transportation facilities are provided for existing and future inhabitants of the City.

Policy 2.1: Require that all new development pay its share of the street improvement costs associated with the development, including regional traffic mitigation.

Policy 2.2: New revenues generated from Measure M shall not be used to replace private developer funding which has been committed for any project.

Policy 2.3: The City shall continue to collect Transportation System Improvement Program (TSIP) fees for improvements within its boundaries and shall work with adjacent jurisdictions to determine acceptable impact fees within the growth management areas. These fees may be assessed as necessary in addition to the City's TSIP fees to cover shortfalls that may not be generated by the established fee program.

Policy 2.4: A Deficient Intersection Fund shall be established by the City to make improvements on those intersections necessary to achieve the LOS standard established in this Element.

Policy 2.5: All new development shall be required to establish a development phasing program which phases approval of

*Not required for Growth Management Element but required to meet Measure M requirements.

development commensurate with required improvements to roadway capacity. The Phasing Plan shall include an overall buildout development plan which can demonstrate the ability of the infrastructure to support the planned development.

Policy 2.6: Development phasing for new projects shall be a component of the development review and entitlement process and shall be approved prior to issuance of building or grading permits.

Policy 2.7: The City shall monitor the implementation of the development phasing program of each of the new development projects on an annual basis and prepare a report which indicates the status of development approval and required traffic improvements and relationship between them.

Policy 2.8: A Performance Monitoring Program shall be developed to provide an annual evaluation of compliance with development phasing and evaluation of the maintenance of transportation service levels.

Policy 2.9: A Seven Year Capital Improvement Program shall be adopted and maintained in conformance with provisions of Measure M for the purpose of maintaining adopted traffic level of service standards established in this Element.

INTERJURISDICTIONAL COORDINATION/COOPERATION

Traffic congestion in Tustin is both a regional and local problem. The development which occurs in neighboring jurisdictions and throughout the County has effects upon the freeways and many of the major arterials that traverse the City of Tustin. Thus, the City cannot fully address growth management issues in isolation from other jurisdictions.

GOAL 3: Cooperate with neighboring jurisdictions and the County to achieve reduction in regional traffic congestion.

Policy 3.1: The City shall participate in interjurisdictional planning forums within its established growth management area as adopted by the Regional Advisory Planning Council and will continue to participate in forums with neighboring or affected jurisdictions to address transportation or other planning issues.

Policy 3.2: The City will continue to cooperate with the County of Orange in annually updating its Congestion Management Plan pursuant to the requirement of AB 471 in order to continue to receive its share of State gasoline sales tax revenues.

JOBS/HOUSING BALANCE

One of the major causes of traffic congestion is land use patterns that hinder the ability of people to live and work in the same area. Long commutes can overburden traffic infrastructure and diminish quality of life. Creating communities where people can both live and work in relatively close proximity shortens commutes and encourages the use of alternative forms of transportation to and from employment.

GOAL 4: Strive to develop and maintain a balance between jobs and housing in Tustin.

Policy 4.1: To the extent feasible, utilize information on the jobs/housing balance in the City and region as a factor in land use decision-making.

THE GROWTH MANAGEMENT PLAN

The City's Growth Management Plan includes all of the components required for Developed Communities by Measure M, the Traffic Improvement and Growth Management Ordinance. Additional implementation programs independent of this Element will be required in order to implement the Growth Management Plan.

TRAFFIC LEVEL OF SERVICE GOALS

Policy 1.1 of this Element requires that development sponsors make necessary improvements to the circulation system, where affected by their development, so as to maintain acceptable LOS levels at intersections and on roadway links under City control. Roadway expansions will be planned as part of the Capital Improvement Program and phased according to the Comprehensive Phasing Program. The LOS goals will be enforced through conditions of approval and monitored annually through the Performance Monitoring Program.

Achievement of the adopted Levels of Service standard and implementation of exacted transportation improvements shall take into consideration extraordinary transportation circumstances which may impact identified intersections and/or timing of the required improvements. An example of an extraordinary circumstance would be when arterial roadways serve as substitute freeway access (thus impacting LOS performance) while planning and construction of additional freeway improvements are underway.

DEVELOPMENT MITIGATION PROGRAM

The City shall establish a Development Mitigation Program based on Orange County Transportation Authority (OCTA) timetables to ensure that all new development pays its share of needed transportation improvements to the City's roadway network associated with that development. Participation shall be on a pro-rata basis and be required of all development projects

except where an increased level of participation exceeding these requirements is established through negotiated legal mechanisms.

The City will work to facilitate coordination of this program through inter-jurisdictional forums in order to determine minimally acceptable impact fees for application within the GMAs. The City will receive credit for existing traffic mitigation fee programs with regard to the GMA base level fee.

COMPREHENSIVE PHASING PROGRAM

The City shall prepare a Comprehensive Phasing Program (CPP) based on OCTA timetables. The purpose of this program is to ensure to the extent feasible that adequate infrastructure (roadways, utilities) is constructed as development occurs by linking the ability of the development to proceed to either construction of the improvement(s) by others, construction of the improvement(s) by the developer, or by the developer's timely provision of the appropriate funding to the City so that the provision of these facilities is in balance with demand. While the Comprehensive Phasing Program will provide plans for new facilities, the Performance Monitoring Program will provide annual evaluation of compliance with phasing plans in order for development to continue. The Comprehensive Phasing Program shall provide reasonable lead time (three years from first building permit or five years from first grading permit) to design and construct specific transportation improvements.

PERFORMANCE MONITORING PROGRAM

The City shall prepare a Performance Monitoring Program based on OCTA timetables. The Performance Monitoring Program will establish a system for annual evaluation of compliance with development phasing allocations. Under this program, roadway and other transportation facility improvements or fundings must actually be provided in order for new development to continue. If the improvements/funding are not provided, development shall be deferred until compliance with the provisions of this program are achieved.

The Performance Monitoring program will provide an annual evaluation of the maintenance of transportation service levels.

Annual traffic reports prepared under this Program shall utilize data collected within three (3) months of preparation of the report. In the event that the Performance Monitoring Program identifies one or more service level deficiencies, measures shall be implemented to correct identified deficiencies.

CAPITAL IMPROVEMENT PLANS

The City shall establish a Capital Improvement Program for transportation systems improvements to effectively manage the system based on OCTA timetables. The purpose of the Capital Improvement Plans is to estimate future development over a seven year period and determine the necessary infrastructure and associated costs required for this new development. The Capital Improvement Plans will be closely linked with the Comprehensive Phasing Plans.

The City will determine the capital projects needed to meet and maintain both the City's adopted Traffic Level of Service and Performance Standards. Capital financing programming will be based on proposed development to be constructed during (at a minimum) the following seven year period. The CIP shall include approved projects and an analysis of the costs of proposed projects as well as a financing plan for providing the improvements.

INTERJURISDICTIONAL COOPERATION

The City of Tustin will become involved in interjurisdictional coordination for various purposes, including:

- Cooperating with the County of Orange, the Orange County Transportation Authority (OCTA), and other local jurisdictions through the Regional Advisory and Planning Council (RAPC), or other appointed bodies, on the implementation of Measure M and the development of future revisions.
- Working with interjurisdictional forums (such as the City-County Coordinating Committee) to make sure that the City's fees are consistent with minimally acceptable impact fees for application within the larger Growth Management Area;

- Participating in the Interjurisdictional Planning Forums at the Growth Management Area (GMA) level to discuss implementation of traffic improvements, cooperative land use planning, and appropriate mitigation measures for developments with multi-jurisdictional impacts;
- Working with the interjurisdictional forums to develop strategies for bringing about greater jobs/housing balance at the subregional level;
- Cooperating with the County of Orange in implementing the Facility Implementation Plans and collaborating in the Development Monitoring Program;
- Cooperating with State, County, and local governments in planning and implementing the City's Circulation Element, and coordinating efforts to ensure orderly development; and
- Coordinating population, housing, employment and land use projections with the State Department of Finance, SCAG, the County of Orange Development Monitoring Program, school and water districts.

COMPREHENSIVE DEVELOPMENT PLANS FOR LARGE PROJECTS

Tustin will require that any new large developments prepare a comprehensive development plan and environmental impact analysis. A Specific Plan is an example of a Comprehensive Development Plan for large projects. This will allow the City to anticipate the impacts of large projects prior to development of any portion of the projects, and permit more time to plan for public services and facilities needed to support the projects.

COORDINATION WITH ADJACENT JURISDICTIONS

Apart from coordination with subregional interjurisdictional forums (such as the City-County Coordinating Committee), the City will separately work with other cities and agencies in the immediate area to develop mutual agreements for review and possible conditioning of development projects.

APPENDIX

DEFINITIONS

For the purpose of this element, the following terms are defined below:

1. **Capital Improvement Program (CIP)** shall mean a listing of capital projects needed to meet, maintain and improve a jurisdictions adopted Traffic Level of Service and Performance Standards. The CIP shall include approved projects and an analysis of the costs of the proposed projects as well as a financial plan for providing the improvements.
2. **Comprehensive Phasing Program (CPP)** shall mean a road and public facilities improvement and financing plan which attains the level of service requirements in this Element. With regard to road improvements, a CPP must include level of service requirements and take into account measurable traffic impacts on the circulation system.
3. **Critical Movement** shall mean any of the conflicting through or turning movements at an intersection which determine the allocation of green signal time.
4. **Development Phasing Program** shall mean a program which establishes the requirement that building and grading permits shall be approved or issued in a manner that assures implementation of required transportation and public facilities improvements. The City shall specify the order of improvements and the number of dwelling units based, at a minimum, on mitigation measures adopted in conjunction with environmental documentation and other relevant factors.
5. **Deficient Intersection Fund** shall mean a trust fund established to implement necessary improvements to existing intersections which do not meet the Traffic Level of Service Policy.
6. **Deficient Intersection List** shall mean a list of intersections that:
 - a) do not meet the Traffic Level of Service Policy for reasons that are beyond the control of the City (e.g., ramp metering effects, traffic generated outside the City's jurisdiction, etc.); and
 - b) that are not brought into compliance with the LOS standard in the most current Seven-Year Capital Improvement Program.

Additional intersections may be added by the City to the Deficient Intersection List only as a result of conditions which are beyond the control of the City.

7. **Growth Management Area (GMAs)** shall mean subregions of the County established by the City-County Coordination Committee (or successor) to promote inter-jurisdictional coordination in addressing infrastructure concerns and in implementing needed improvements.
8. **Growth Management Element** shall mean the Growth Management Element of the City General Plan as required by the Revised Traffic Improvement and Growth Management Ordinance (Measure M).
9. **Local Transportation Authority** as currently designated by the Board of Supervisors shall mean the Orange County Transportation Authority.
10. **Measurable Traffic** shall mean a traffic volume resulting in a 1% increase in the sum of the critical movements at an intersection.
11. **Performance Monitoring Program (PMP)** shall mean a comprehensive road improvement and financing plan which monitors the level of service requirements in this Element while taking into account measurable traffic impacts on the circulation system. This program will annually review the status of public and private roadway improvements associated with the Seven Year Capital Improvement Program and Development Phasing Programs to assure that the appropriate actions are being taken to achieve the Level of Service standards set forth in this Element.
12. **Sole Control** shall mean under the direct control of the single public agency; for purposes of this Element, the City of Tustin is the single public agency exercising sole control over certain transportation system improvements.



Glossary



GLOSSARY

The following set of terms are used in the Housing Element and can be defined as noted. Certain terms are also defined within individual elements.

Access - A way of approaching or entering a property, including ingress (the right to enter) and egress (the right to leave).

Acres, Net - The portion of a site that can actually be built upon. The following generally are not included in the net acreage of a site: public or private road rights-of-way, public open space, and flood ways.

ADT - Average daily trips made by vehicles on persons in a 24-hour period.

Air Basin - One of 14 self-contained regions of California minimally influenced by air quality in contiguous regions.

Air Pollutant Emissions - Discharges into the atmosphere, usually specified in terms of weight per unit of time for a given pollutant from a given source.

Air Pollution - The presence of contaminants in the air in concentrations that exceed naturally occurring quantities and are undesirable or harmful.

Air Quality Standards - The prescribed (by the Environmental Protection Agency and the California Air Resources Board) level of pollutants in the outside air that cannot be exceeded legally during a specified time in a specified geographical area.

ALUC - Airport Land Use Commission.

Ambient Noise Level - The overall of noise from all sources near and far. In this context, the ambient noise level constitutes the normal or existing level of environmental noise at a given location.

Annexation - The incorporation of a land area into an existing city with a resulting change in the boundaries of that city.

Application For Development - The application form(s) and all accompanying documents and exhibits required of an applicant by an approving authority for development review by governmental agency(s).

Aquifer - An underground bed or layer of earth, gravel or porous stone that contains water.

Archaeological Site - Land or water areas which show evidence of human, plant or animal activity, usually dating from periods of which only vestiges remain.

Arterial - A major street carrying the traffic of local and collector streets to and from freeways and other major streets, with controlled intersections and generally providing direct access to nonresidential properties.

Assisted Housing - Generally multi-family rental housing, but sometimes single-family ownership units, whose construction, financing, sales prices, or rents have been subsidized by federal, state, or local housing programs including, but not limited to Federal Section 8 (new construction, substantial rehabilitation, and loan management set-asides), Federal Sections 213, 236, and 202, Federal Section 221(d)(3) (below-market interest rate program), Federal Section 101 (rent supplement assistance), CDBG, FmHA Section 515, multi-family mortgage revenue bond programs, local redevelopment and in lieu fee programs, and units developed pursuant to local inclusionary housing and density bonus programs.

A-Weighted Decibel (dBA) - A numerical method of rating human judgement of loudness. The A-weighted scale reduces the effects of low and high frequencies in order to simulate human hearing.

Base Flood Elevation - The highest elevation, expressed in feet above sea level, of the level of flood waters expected to occur during a 100-year flood (i.e., a flood that has 1 percent likelihood of occurring in any given year).

Benefit Assessment District - An area within a public agency's boundaries which receives a special benefit from the construction of one or more public facilities. A Benefit Assessment District has no legal life of its own and cannot act by itself. It is strictly a financing mechanism for providing public infrastructure as allowed under the Streets And Highways Code. Bonds may be issued to finance the improvements, subject to repayment by assessments charged against the benefitting properties. Creation of a Benefit Assessment District enables property owners in a specific area to cause the construction of public facilities or to maintain them (for example, a downtown, or the grounds and landscaping of a specific area) by contributing their fair share of the construction and/or installation and operating costs.

Bicycle Lane (Class II facility) - A corridor expressly reserved for bicycles, existing on a street or roadway in addition to any lanes for use by motorized vehicles.

Bicycle Path (Class I facility) - A paved route not on a street or roadway and expressly reserved for bicycles traversing an otherwise unpaved area. Bicycle paths may parallel roads but typically are separated from them by landscaping.

Bicycle Route (Class III facility) - A facility shared with motorists and identified only by signs, a bicycle route has no pavement markings or lane stripes.

Bikeways - A term that encompasses bicycle lanes, bicycle paths, and bicycle routes.

Blight - A condition of a site, structure, or area that may cause nearby buildings and/or areas to decline in attractiveness and/or utility. The Community Redevelopment Law (Health and Safety Code, Sections 33031 and 33032) contains a definition of blight used to determine eligibility of proposed redevelopment project areas.

Buffer - A strip of land designated to protect one type of land use from another with which it is incompatible. Where a commercial district abuts a residential district, for example, additional use, yard, or height restrictions may be imposed to protect residential properties. The term may also be used to describe any zone that separates two unlike zones such as a multi-family housing zone between single family housing and commercial uses.

Building - Any structure having a roof supported by columns or walls and intended for the shelter, housing or enclosure of any individual, animal, process, equipment, goods or materials of any kind or nature.

California Environmental Quality Act (CEQA) - A State law requiring State and local agencies to regulate activities with consideration for environmental protection. If a proposed activity has the potential for a significant adverse environmental impact, an Environmental Impact Report (EIR) must be prepared and certified as to its adequacy before taking action on the proposed project. General Plans require the preparation of a "program EIR."

California Housing Finance Agency

(CHFA) - A State agency, established by the Housing and Home Finance Act of 1975, which is authorized to sell revenue bonds and generate funds for the development, rehabilitation, and conservation of low-and moderate-income housing.

Caltrans - California Department of Transportation.

Capital Improvement Program (CIP) - A proposed timetable or schedule of all future capital improvements (government acquisition of real property, major construction project, or acquisition of long lasting, expensive equipment) to be carried out during a specific period and listed in order of priority, together with cost estimates and the anticipated means of financing each project. Capital improvement programs are usually projected five or six years in advance and should be updated annually.

Census - The official decennial enumeration of the population conducted by the federal government.

City - City, with a capital "C," generally refers to the government or administration of a city. City, with a lower case "c" may mean any city, or may refer to the geographical area of a city (e.g., the city's bikeway system.)

Clean Air Act - Federal legislation establishing national air quality standards.

Clustered Development - Development in which a number of dwelling units are placed in closer proximity than usual, or are attached, with the purpose of retaining an open space area.

Collector - A street for traffic moving between arterial and local streets, generally providing direct access to properties.

Community Development Block Grant (CDBG) - A grant program administered by the U.S. Department of Housing and Urban Development (HUD) on a formula basis for entitlement communities, and by the State Department of Housing and Community Development (HCD) for nonentitled jurisdictions. This grant allots money to cities and counties for housing rehabilitation and community development, including public facilities and economic development.

Community Facilities District (CFD) - Under the Mello-Roos Community Facilities Act of 1982 (Government Code Section 53311 et seq), a legislative body may create within its jurisdiction a special district that can issue tax-exempt bonds for the planning, design, acquisition, construction, and/or operation of public facilities, as well as provide public services to district residents. Special tax assessments levied by the district are used to repay the bonds.

Community Noise Equivalent Level

(CNEL) - The average equivalent sound level during a 24-hour day, obtained after addition of five decibels to sound levels in the evening from 7 p.m. to 10 p.m. and after addition of 10 decibels to sound levels in the night after 10 p.m. and before 7 a.m. See also "A-Weighted Decibel."

Community Redevelopment Agency (CRA) - A local agency created under California Redevelopment Law, or a local legislative body which has elected to exercise the powers granted to such an agency, for the purpose of planning, developing, re-planning, redesigning, clearing, reconstructing, and/or rehabilitating all or part of a specified area with residential, commercial, industrial, and/or public (including recreational) structures and facilities. The redevelopment agency's plans must be compatible with adopted community general plans.

Compatibility - The characteristics of different uses or activities that permit them to be located near each other in harmony and without conflict. The designation of permitted and conditionally permitted uses in zoning districts are intended to achieve compatibility within the district. Some elements affecting compatibility include: intensity of occupancy as measured by dwelling units per acre; pedestrian or vehicular traffic generated; volume of goods handled; and such environmental effects as noise, vibration, glare, air pollution, or the presence of hazardous materials. On the other hand, many aspects of compatibility are based on personal preference and are much harder to measure quantitatively, at least for regulatory purposes.

Condominium - A building, or group of buildings, in which units are owned individually, and the structure, common areas and facilities are owned by all the owners on a proportional, undivided basis.

Congestion Management Plan (CMP) - A mechanism employing growth management techniques, including traffic level of service requirements, development mitigation programs, transportation systems management, and capital improvement programming, for the purpose of controlling and/or reducing the cumulative regional traffic impacts of development. AB 1791, effective August 1, 1990, requires all cities, and counties that include urbanized areas, to adopt and annually update a Congestion Management Plan.

Congregate Care Housing - Generally defined as age-segregated housing built specifically for the elderly which provides services to its residents, the minimum of which is usually an on-site meal program, but which may also include housekeeping, social activities, counseling, and transportation. There is generally a minimum health requirement for acceptance into a congregate facility as most do not offer supportive health care services, thus differing from a nursing home. Residents usually have their own bedrooms and share common areas such as living rooms, dining rooms, and kitchens; bathrooms may or may not be shared.

Conservation - The management of natural resources to prevent waste, destruction or neglect.

Cooperative - A group of dwellings or an apartment building that is jointly owned by the residents, the common ownership including the open space and all other parts of the property. The purchase of stock entitles the buyer to sole occupancy, but not the individual ownership of a specified unit.

Council of Governments (COG) - A regional planning and review authority whose membership includes representation from all communities in the designated region. The Southern California Association of Governments (SCAG) and the San Bernardino Association of Governments (SANBAG) are examples of COGs in Southern California.

Coverage - The proportion of the area of the footprint of a building to the area of the lot on which it stands.

CRA - Community Redevelopment Agency.

Critical Facility - Facilities housing or serving many people which are necessary in the event of an earthquake or flood, such as hospitals, fire, police, and emergency service facilities, utility "lifeline" facilities, such as water, electricity, and gas supply, sewage disposal, and communications and transportation facilities.

Cumulative Impact - As used in CEQA, the total impact resulting from the accumulated impacts of individual projects or programs over time.

Day-Night Average Level (Ldn) - The average equivalent sound level during a 24-hour day, obtained after addition of 10 decibels to sound levels in the night after 10 p.m. and before 7 a.m. See also "Community Noise Equivalent Level."

Decibel (dB) - A unit for describing the amplitude of sound, as it is heard by the human ear. See also "A-Weighted Decibel," "Community Noise Equivalent Level," and "Day-Night Average Level."

Dedication - The turning over by an owner or developer of private land for public use, and the acceptance of land for such use by the governmental agency having jurisdiction over the public function for which it will be used. Dedications for roads, parks, school sites, or other public uses often are made conditions for approval of a development by a city.

Density - The number of families, individuals, dwelling units or housing structures per unit of land; usually density is expressed "per acre." Thus, the density of a development of 100 units occupying 20 acres is 5.0 units per acre.

Density Bonus - The allocation of development rights that allow a parcel to accommodate additional square footage or additional residential units beyond the maximum for which the parcel is zoned, usually in exchange for the provision or preservation of an amenity at the same site or at another location.

Density Transfer - A way of retaining open space by concentrating densities, usually in compact areas adjacent to existing urbanization and utilities, while leaving unchanged historic, sensitive, or hazardous areas.

Developer - An individual who or business which prepares raw land for the construction of buildings or causes to be built physical building space for use primarily by others, and in which the preparation of the land or the creation

of the building space is in itself a business and is not incidental to another business or activity.

Development - The division of a parcel of land into two or more parcels; the construction, reconstruction, conversion, structural alteration, relocation or enlargement of any structure; any mining, excavation, landfill or land disturbance, and any use or extension of the use of land.

Development Impact Fees - A fee or charge imposed on developers to pay for the costs to the City of providing services to a new development.

Development Plan - A plan, to scale, showing uses and structures proposed for a parcel or multiple parcels of land. It includes lot lines, streets, building sites, public open space, buildings, major landscape features and locations of proposed utility services.

Development Rights - The right to develop land by a land owner who maintains fee-simple ownership over the land or by a party other than the owner who has obtained the rights to develop. Such rights usually are expressed in terms of density allowed under existing zoning. For example, one development right may equal one unit of housing or may equal a specific number of square feet of gross floor area in one or more specified zone districts.

Dwelling - A structure or portion of a structure used exclusively for human habitation.

Dwelling, Multi-Family - A building containing two or more dwelling units for the use of individual families maintaining households; an apartment or condominium building is an example of this dwelling unit type.

Dwelling, Single-Family Attached - A one family dwelling attached to one or more other one family dwellings by a common vertical wall; duplexes and townhomes are examples of this dwelling unit type.

Dwelling, Single-Family Detached - A dwelling which is designed for and occupied by not more than one family and surrounded by open space or yards and which is not attached to any other dwelling.

Dwelling Unit - One or more rooms, designed, occupied or intended for occupancy as separate living quarters, with cooking, sleeping and sanitary facilities provided within the unit for the exclusive use of a single family maintaining a household.

Easement - A grant of one or more of the property rights by the property owner to and/or for use by the public, a corporation, or another person or entity.

Economic Base - The production, distribution and consumption of goods and services within a planning area.

Element - A division of the General Plan referring to a topic area for which goals, policies, and programs are defined (e.g., land use, housing, circulation).

Eminent Domain - The authority of a government to take, or to authorize the taking of, with compensation, private property for public use.

Endangered Species - A species of animal or plant is considered to be endangered when its prospects for survival and reproduction are in immediate jeopardy from one or more causes.

Environment - The sum of all external conditions and influences affecting the life, development and, ultimately, the survival of an organism.

Environmental Impact Report (EIR) - A report, as prescribed by the California Environmental Quality Act (CEQA), on the effect of a development proposal and other major actions which significantly affect the environment.

Essential Facilities - Those facilities whose continued functioning is necessary to maintain public health and safety following a disaster. These facilities include fire and police stations, communications facilities, emergency operation centers, hospitals, administrative buildings, and schools designated as mass care shelters. Also included are key transportation facilities and utility facilities such as water supply, sewage disposal, gas storage facilities and transmission lines, and electric generation stations and transmission lines.

Exaction - A contribution or payment required as an authorized precondition for receiving a development permit; usually refers to mandatory dedication (or fee in lieu of dedication) requirements found in many subdivision regulations.

Fault - A fracture in the earth's crust forming a boundary between rock masses that have shifted.

Fault, Active - A fault that has moved within the last 11,000 years and which is likely to move again within the next 100 years.

Fault, Inactive - A fault which shows no evidence of movement in the last 11,000 years and no potential for movement in the relatively near future.

Fault, Potentially Active - A fault that last moved within the Quaternary Period (the last 2,000,000 to 11,000 years) before the Holocene Epoch (11,000 years to the present); or a fault which, because it is judged to be capable of ground rupture or shaking, poses an unacceptable risk for a proposed structure.

FEMA - Federal Emergency Management Agency.

FHWA - Federal Highway Administration.

Finding(s) - The result(s) of an investigation and the basis upon which decisions are made. Findings are used by government agents and bodies to justify action taken by the entity.

Fire Flow - A rate of water flow that should be maintained to halt and reverse the spread of a fire.

Flood Insurance Rate Map (FIRM) - For each community, the official map on which the Federal Insurance Administration has delineated areas of special flood hazard and the risk premium zones applicable to that community.

Flood Plain - A lowland or relatively flat area adjoining the banks of a river or stream which is subject to a one percent or greater chance of flooding in any given year (i.e., 100-year flood).

Flood, Regulatory Base - Flood having a one percent chance of being equalled or exceeded in any given year (100-year flood).

Floodway - The channel of a watercourse or river, and portions of the flood plain adjoining the channel, which are reasonably required to carry and discharge the base flood of the channel.

Floor Area Ratio (FAR) - The gross floor area of all buildings on a lot divided by the lot area; usually expressed as a numerical value (e.g., a building having 5,000 square feet of gross floor area located on a lot of 10,000 square feet in area has a floor area ratio of .5:1).

FmHA - Farmers Home Administration.

General Plan - A legal document which takes the form of a map and accompanying text adopted by the local legislative body. The plan is a compendium of policies regarding the long-term development of a jurisdiction. The state requires the preparation of seven elements or divisions as part of the plan: land use, housing, circulation, conservation, open space, noise, and safety. Additional elements pertaining to the unique needs of an agency are permitted.

Goal - The ultimate purpose of an effort stated in a way that is general in nature and immeasurable; a broad statement of intended direction and purpose (e.g., "A balance of land use types within the city").

Grade - The degree of rise or descent of a sloping surface.

Greenbelt - An open area which may be cultivated or maintained in a natural state surrounding development or used as a buffer between land uses or to mark the edge of an urban or developed area.

Ground Failure - Mudslide, landslide, liquefaction or the compaction of soils due to ground shaking from an earthquake.

Ground Shaking - Ground movement resulting from the transmission of seismic waves during an earthquake.

Groundwater - The supply of fresh water under the ground surface in an aquifer or soil that forms a natural reservoir.

Group Quarters - A dwelling that houses unrelated individuals.

Growth Management - Techniques used by government to control the rate, amount and type of development.

Habitat - The physical location or type of environment in which an organism or biological population lives or occurs.

HCD - State Department of Housing and Community Development.

HDC - Non-profit Housing Development Corporation.

HMDA - Home Investment Partnership Act.

HOME - Home Investment Partnership Act.

HOPE - Homeownership for People Everywhere.

Hazardous Materials - An injurious substance, including pesticides, herbicides, toxic metals and chemicals, liquified natural gas, explosives, volatile chemicals and nuclear fuels.

Historic Area - A district, zone or site designated by local, state or federal authorities within which buildings, structures and places are of basic and vital importance due to their association with history, or their unique architectural style and scale, or their relationship to a square or park, and therefore should be preserved and/or developed in accord with a fixed plan.

Household - According to the Census, a household is all persons living in a dwelling unit whether or not they are related. Both a single person living in an apartment and a family living in a house are considered households.

Household Income - The total income of all the people living in a household. Households are usually described as very low income, low income, moderate income, and upper income for that household size, based on their position relative to the regional median income.

Housing Affordability - Based on State and Federal standards, housing is affordable when the housing costs are no more than 30 percent of household income.

Housing Unit - A room or group of rooms used by one or more individuals living separately from others in the structure, with direct access to the outside or to a public hall and containing separate toilet and kitchen facilities.

HUD - U.S. Department of Housing and Urban Development.

Human Services - The programs which are provided by the local, state, or federal government to meet the health, welfare, recreational, cultural, educational, and other special needs of its residents.

Implementation Measure - An action, procedure, program, or technique that carries out general plan policy.

Income Categories - Four categories for classifying households according to income based on the median income for each County. The categories are as follows: Very Low (0-50% of County median); Low (50-80% of County median); Moderate (80-120% of County median); and Upper (over 120% of County median).

Infrastructure - The physical systems and services which support development and population, such as roadways, railroads, water, sewer, natural gas, electrical generation and transmission, telephone, cable television, storm drainage, and others.

Intensity - A measure of the amount or level of development often expressed as the ratio of building floor area to lot area (floor area ratio) for commercial, business, and industrial development, or dwelling units per acre of land for residential development (also called "density").

Intersection - Where two or more roads cross at grade.

Issue - A problem, constraint, or opportunity requiring community action.

Jobs/Housing Balance; Jobs/Housing Ratio - The jobs/housing ratio divides the number of jobs in an area by the number of employed residents. A ratio of 1.0 indicates a balance. A ratio greater than 1.0 indicates a net in-commute of employed persons; less than 1.0 indicates a net out-commute of employed persons.

Joint Powers Authority (JPA) - A legal arrangement that enables two or more units of government to share authority in order to plan and carry out a specific program or set of programs that serves both units.

Landscaping - Planting--including trees, shrubs, and ground covers--suitably designed, selected, installed, and maintained as to enhance a site or roadway.

Land Use - A description of how land use is occupied or used.

Land Use Plan - A plan showing the existing and proposed location, extent and intensity of development of land to be used in the future for varying types of residential, commercial, industrial, agricultural, recreational and other public and private purposes or combination of purposes.

Landslide - A general term for a falling or sliding mass of soil or rocks.

LIHPRHA - Low Income Housing Preservation and Resident Homeownership.

Liquefaction - A process by which water-saturated granular soils transform from a solid to a liquid state due to groundshaking. This phenomenon usually results from shaking from energy waves released in an earthquake.

Local Agency Formation Commission (LAFCo) - A five or seven-member commission within each county that reviews and evaluates all proposals for formation of special districts, incorporation of cities, annexation to special districts or cities, consolidation of districts, and merger of districts with cities. Each county's LAFCo is empowered to approve, disapprove, or conditionally approve such proposals.

Local Street - A street providing direct access to properties and designed to discourage through-traffic.

Lot - The basic unit of land development. A designated parcel or area of land established by plat, subdivision, or as otherwise permitted by law, to be used, developed or built upon as a unit.

LOS - Level of Service.

Manufactured Housing - Residential structures which are constructed entirely in the factory, and which since June 15, 1976, have been regulated by the federal Manufactured Home Construction and Safety Standards Act of 1974 under the administration of the U.S. Department of Housing and Urban Development (HUD).

Median Income - The annual income for each household size which is defined annually by the Federal Department of Housing and Urban Development. Half of the households in the region have incomes above the median and half are below.

Mineral Resource - Land on which known deposits of commercially viable mineral or aggregate deposits exist. This designation is applied to sites determined by the State Division of Mines and Geology as being a resource of regional significance, and is intended to help maintain the quarrying operations and protect them from encroachment of incompatible land uses.

Mining - The act or process of extracting resources, such as coal, oil, or minerals, from the earth.

Mitigate, - To ameliorate, alleviate, or avoid to the extent reasonably feasible.

Mobile Home - A structure, transportable in one or more sections, which is at least 8 feet in width and 32 feet in length, which is built on a permanent chassis and designed to be used as a dwelling unit, with or without a permanent foundation when connected to the required utilities.

Modular Unit - A factory-fabricated, transportable building or major component designed for use by itself or for incorporation with similar units on-site into a structure for residential, commercial, educational, or industrial use. Differs from mobile homes and manufactured housing by (in addition to lacking an integral chassis or permanent hitch to allow future movement) being subject to California housing law design standards. California standards are more restrictive than federal standards in some respects (e.g., plumbing and energy conservation). Also called Factory-built Housing and regulated by State law of that title.

National Environmental Policy Act

(NEPA) - An act passed in 1974 establishing federal legislation for national environmental policy, a council on environmental quality, and the requirements for environmental impact statements.

National Flood Insurance Program - A federal program which authorizes the sale of federally subsidized flood insurance in communities where such flood insurance is not available privately.

National Historic Preservation Act - A 1966 federal law that established a National Register of Historic Places and the Advisory Council on Historic Preservation, and which authorized grants-in-aid for preserving historic properties.

Noise - Any undesired audible sound.

Noise Exposure Contours - Lines drawn about a noise source indicating constant energy levels of noise exposure. CNEL and Ldn are the metrics utilized to describe community noise exposure.

Non-attainment - The condition of not achieving a desired or required level of performance. Frequently used in reference to air quality.

Non-conforming Use - A use that was valid when brought into existence, but by subsequent regulation becomes no longer conforming. "Non-conforming use" is a generic term and includes (1) non-conforming structures (by virtue of size, type of construction, location on land, or proximity to other structures), (2) non-conforming use of a conforming building, (3) non-conforming use of a non-conforming building, and (4) non-conforming use of land. Thus, any use lawfully existing on any piece of property that is inconsistent with a new or amended General Plan, and that in turn is a violation of a zoning ordinance amendment subsequently adopted in conformance with the General Plan, will be a non-conforming use.

Non-Domestic Water - Water consisting of but not limited to, a combination of treated wastewater and intercepted surface stream flow, supplemented by other waters including potable water.

Open Space - Any parcel or area of land or water essentially unimproved and set aside, designated, dedicated or reserved for public or private use or enjoyment.

Ordinance - A law or regulation set forth and adopted by a governmental authority, usually a city or county.

Overcrowding - As defined by the Census, a household with greater than 1.01 persons per room, excluding bathrooms, kitchens, hallways, and porches.

Parcel - A lot or tract of land.

Planning and Research, Office of (OPR) -

A governmental division of the State of California which has among its responsibilities the preparation of a set of guidelines for use by local jurisdictions in drafting General Plans.

Planning Area - The Planning Area is the land area addressed by the General Plan. Typically, the Planning Area boundary coincides with the Sphere of Influence which encompasses land both within the City Limits and potentially annexable land.

Planning Commission - A body, usually having five or seven members, created by a city or county in compliance with California law (Section 65100) which requires the assignment of the planning functions of the city or county to a planning department, planning commission, hearing officers, and/or the legislative body itself, as deemed appropriate by the legislative body.

Policy - Statements guiding action and implying clear commitment found within each element of the general plan (e.g., "Provide incentives to assist in the development of affordable housing").

Pollution - The presence of matter or energy whose nature, location, or quantity produces undesired environmental effects.

Program - A coordinated set of specific measures and actions (e.g., zoning, subdivision procedures, and capital expenditures) the local government intends to use in carrying out the policies of the general plan.

Recreation, Active - A type of recreation or activity which requires the use of organized play areas including, but not limited to, softball, baseball, football and soccer fields, tennis and basketball courts and various forms of children's play equipment.

Recreation, Passive - Type of recreation or activity which does not require the use of organized play areas.

Redevelopment - Redevelopment, under the California Community Redevelopment Law, is a process with the authority, scope, and financing mechanisms necessary to provide stimulus to reverse current negative business trends, remedy blight, provide job development incentives, and create a new image for a community. It provides for the planning, development, redesign, clearance, reconstruction, or rehabilitation, or any combination of these, and the provision of public and private improvements as may be appropriate or necessary in the interest of the general welfare. In a more general sense, redevelopment is a process in which existing development and use of land is replaced with newer development and/or use.

Regional - Pertaining to activities or economies at a scale greater than that of a single jurisdiction, and affecting a broad homogeneous area.

Regulation - A rule or order prescribed for managing government.

Rehabilitation - The upgrading of a building previously in a dilapidated or substandard condition, for human habitation or use.

Restoration - The replication or reconstruction of a building's original architectural features, usually describing the technique of preserving historic buildings.

Retrofit - To add materials and/or devices to an existing building or system to improve its operation, safety, or efficiency. Buildings have been retrofitted to use solar energy and to strengthen their ability to withstand earthquakes, for example.

Rezoning - An amendment to the map and/or text of a zoning ordinance to effect a change in the nature, density, or intensity of uses allowed in a zoning district and/or on a designated parcel or land area.

Right-of-Way - A strip of land acquired by reservation, dedication, prescription or condemnation and intended to be occupied or occupied by a road, crosswalk, railroad, electric transmission lines, oil or gas pipeline, water line, sanitary or storm sewer, or other similar uses.

Risk - The danger or degree of hazard or potential loss.

Sanitary Landfill - The controlled placement of refuse within a limited area, followed by compaction and covering with a suitable thickness of earth and other containment material.

Sanitary Sewer - A system of subterranean conduits which carries refuse liquids or waste matter to a plant where the sewage is treated, as contrasted with storm drainage systems (which carry surface water) and septic tanks or leech fields (which hold refuse liquids and waste matter on-site).

SCAG - Southern California Association of Governments.

Seiche - An earthquake-generated wave in an enclosed body of water such as a lake, reservoir, or bay.

Seismic - Caused by or subject to earthquakes or earth vibrations.

Sensitive Species - Includes those plant and animal species considered threatened or endangered by the U.S. Fish and Wildlife Service and/or the California Department of Fish and Game according to Section 3 of the Federal Endangered Species Act. Endangered - any species in danger of extinction throughout all, or a significant portion of, its range. Threatened - a species likely to become an endangered species within the foreseeable future throughout all, or a portion of, its range. These species are periodically listed

in the Federal Register and are, therefore, referred to as "federally listed" species.

Septic System - A sewage-treatment system that includes a settling tank through which liquid sewage flows and in which solid sewage settles and is decomposed by bacteria in the absence of oxygen. Septic systems are often used for individual-home waste disposal where an urban sewer system is not available.

Sewer - Any pipe or conduit used to collect and carry away sewage from the generating source to a treatment plant.

Significant Effect - A beneficial or detrimental impact on the environment. May include, but is not limited to, significant changes in an area's air, water, and land resources.

Site - A parcel of land used or intended for one use or a group of uses and having frontage on a public or an approved private street. A lot.

Site Plan - The development plan for one or more lots on which is shown the existing and proposed conditions of the lot including: topography, vegetation, drainage, floodplains, marshes and waterways; open spaces, walkways, means of ingress and egress, utility services, landscaping, structures and signs, lighting, and screening devices; any other information that reasonably may be required in order that an informed decision can be made by the approving authority.

Slope - Land gradient described as the vertical rise divided by the horizontal run, and expressed in percent.

Soil - The unconsolidated material on the immediate surface of the earth created by natural forces that serves as natural medium for growing land plants.

Solar Access - A property owner's right to have the sunlight shine on his/her land.

Solid Waste - Unwanted or discarded material, including garbage with insufficient liquid content to be free flowing, generally disposed of in land fills or incinerated.

Special District - A district created by act, petition or vote of the residents for a specific purpose with the power to levy taxes.

Special Needs Groups - Those segments of the population which have a more difficult time finding decent affordable housing due to special circumstances. Under State planning law, these special needs groups consist of the elderly,

handicapped, large families, female-headed households, farmworkers and the homeless.

Specific Plan - Under Article 8 of the Government Code (Section 65450 et seq), a legal tool for detailed design and implementation of a defined portion of the area covered by a General Plan. A specific plan may include all detailed regulations, conditions, programs, and/or proposed legislation which may be necessary or convenient for the systematic implementation of any General Plan element(s).

Sphere of Influence - The probable ultimate physical boundaries and service area of a local agency (city or district) as determined by the Local Agency Formation Commission (LAFCo) of the County.

Standard Metropolitan Statistical Area (SMSA) - A county or group of contiguous counties which contains at least one city of 50,000 inhabitants or more, or twin cities of a combined population of at least 50,000.

Standards - (1) A rule or measure establishing a level of quality or quantity that must be complied with or satisfied. The State Government Code (Section 65302) requires that general plans spell out the objectives, principles, "standards," and proposals of the general plan. Examples of standards might include the number of acres of park land per 1,000 population that the community will attempt to acquire and improve. (2) Requirements in a zoning ordinance that govern building and development as distinguished from use restrictions; for example, site-design regulations such as lot area, height limit, frontage, landscaping, and floor area ratio.

Stationary Source - A non-mobile emitter of pollution.

Structure - Anything constructed or erected which requires location on the ground (excluding swimming pools, fences, and walls used as fences).

Subdivision - The division of a lot, tract or parcel of land that is the subject of an application for subdivision.

Subdivision Map Act - Division 2 (Sections 66410 et seq) of the California Government code, this act vests in local legislative bodies the regulation and control of the design and improvement of subdivisions, including the requirement for tentative and final maps. (See "Subdivision.")

Subsidence - The sudden sinking or gradual downward settling and compaction of soil and other surface material with little or no horizontal motion. Subsidence may be caused by a variety of human and natural activity, including earthquakes.

Subsidize - To assist by payment of a sum of money or by the granting of terms or favors that reduce the need for monetary expenditures. Housing subsidies may take the forms of mortgage interest deductions or tax credits from federal and/or state income taxes, sale or lease at less than market value of land to be used for the construction of housing, payments to supplement a minimum affordable rent, and the like.

Substantial - Considerable in importance, value, degree, or amount.

Survey - The process of precisely ascertaining the area, dimensions and location of a piece of land.

Topography - Configuration of a surface, including its relief and the position of natural and man-made features.

Transit - The conveyance of persons or goods from one place to another by means of a local, public transportation system.

Transportation Demand Management (TDM) - A strategy for reducing demand on the road system by reducing the number of vehicles using the roadways and/or increasing the number of persons per vehicle. TDM attempts to reduce the number of persons who drive alone on the roadway during the commute period and to increase the number in carpools, vanpools, buses and trains, walking, and biking. TDM can be an element of TSM (see below).

Transportation Systems Management (TSM) - Individual actions or comprehensive plans to reduce the number of vehicular trips generated by or attracted to new or existing development. TSM measures attempt to reduce the number of vehicle trips by increasing bicycle or pedestrian trips or by expanding the use of bus, transit, carpool, vanpool, or other high occupancy vehicles.

Trip - A one-way journey that proceeds from an origin to a destination via a single mode of transportation; the smallest unit of movement considered in transportation studies. Each trip has one "production end," (or origin--often from home, but not always), and one "attraction end," (destination).

Uniform Building Code (UBC) - A national, standard building code which sets forth minimum standards for construction.

Units At-Risk of Conversion - Housing units that are currently restricted to low-income housing use and will become unrestricted and possibly be lost as low-income housing.

VMT - Vehicle Miles Traveled.

Water Course - Any natural or artificial stream, river, creek, ditch, channel, canal, conduit, culvert, drain, waterway, gully, ravine or wash in which water flows in a definite channel, bed and banks, and includes any area adjacent thereto subject to inundation by reason of overflow or flood water.

Wetland - An area that is inundated or saturated by surface water or groundwater at a frequency and duration sufficient to support a prevalence of vegetation typically adapted for life in saturated soil conditions, commonly known as hydrophytic vegetation.

Zoning - A police power measure, enacted primarily by units of local government, in which the community is divided into districts or zones within which permitted and special uses are established as are regulations governing lot size, building bulk, placement, and other development standards. Requirements vary from district to district, but they must be uniform within the same district. The zoning ordinance consists of a map and text.

Zoning District - A geographical area of a city zoned with uniform regulations and requirements.

Zoning Map - The officially adopted zoning map of the city specifying the location of zoning districts within all geographic areas of the city.

